IMPACTS OF THE 2017 WILDFIRES IN THE UNITED STATES

(115-42)

HEARING

BEFORE THE

SUBCOMMITTEE ON ECONOMIC DEVELOPMENT, PUBLIC BUILDINGS, AND EMERGENCY MANAGEMENT

OF THE

COMMITTEE ON TRANSPORTATION AND INFRASTRUCTURE HOUSE OF REPRESENTATIVES

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CONTENTS	Page
Summary of Subject Matter	iv
WITNESSES	
Robert J. Fenton, Regional Administrator, Federal Emergency Management	
Agency: Testimony Prepared statement Mark Ghilarducci, Director, Governor's Office of Emergency Services, State of California:	6 27
Testimony	6 33
Testimony Prepared statement Eric W. Holly, Deputy Fire Warden/Deputy Director of Emergency Services, Stanislaus County, California:	6 41
Testimony Prepared statement Fire Chief Thomas Jenkins, President and Chairman of the Board, International Association of Fire Chiefs:	6 47
Testimony	6 52



Committee on Transportation and Infrastructure U.S. House of Representatives Washington DC 20515

Chairman

Mathew M. Sturge
Staff Director

FROM:

March 19, 2018

Peter A. De Fazit Ranking Member Kodorino W. Dodrick Donocratic Staff Director

SUMMARY OF SUBJECT MATTER

TO: Members, Subcommittee on Economic Development, Public Buildings, and

Emergency Management

Staff, Subcommittee on Economic Development, Public Buildings, and

Emergency Management

RE: Subcommittee Hearing on "Impacts of the 2017 Wildfires in the United States"

PURPOSE

The Subcommittee on Economic Development, Public Buildings, and Emergency Management will meet on Tuesday, March 20, 2018, at 10:30 a.m. in 2167 Rayburn House Office Building for a hearing entitled "Impacts of the 2017 Wildfires in the United States." The purpose of the hearing is to explore the lessons learned from the catastrophic 2017 wildfires, inform long-term policy solutions, and highlight the importance of mitigation, including provisions contained in the *Disaster Recovery Reform Act* (DRRA). The Subcommittee will hear from witnesses representing the Federal Emergency Management Agency (FEMA), the International Association of Fire Chiefs (IAFC), and state and local emergency management agencies and fire departments.

BACKGROUND

Overview of the 2017 Wildfire Season

In a year of much extreme weather marked by massive hurricanes that devastated Texas, Florida, and the Caribbean, 2017 also included one of the worst wildfire seasons in United States history. Nationwide, over 66,000 wildfires burned over 9.7 million acres of land. In California, alone, over 7,000 wildfires burned through over a half million acres of land. Fierce Santa Ana winds, dry brush and dead trees, combined with human activity, fueled the start of most of the fires. The 2017 wildfires set ablaze a significant portion of the state of California – spreading as far north as the Oregon border and as far south as San Diego. In addition to California, the

¹ https://www.ncdc.noaa.gov/sotc/fire/201713.

² Statistics provided by CalFire, available at http://cdfdata.fire.ca.gov/incidents/incidents_statsevents.

wildfires raged across the Western United States, hitting 10 states in total including parts of Arizona, Oregon, Montana, Nevada, and Washington.³

The Thomas Fire, the most destructive of the 2017 California wildfires, was first reported on December 4, 2017, and quickly became the largest wildfire ever to be recorded in California.⁴ In total, the Thomas Fire destroyed 281,620 acres of land and an estimated 1,063 structures and threatened another 18,000 structures. The Thomas Fire was finally declared contained on January 12, 2018. Approximately \$177 million was spent on fighting the Thomas Fire alone. At least 95,000 Californians were forced to evacuate their homes due to the 2017 wildfires.

The 2017 wildfire season was the most destructive and the costliest for California in its history and the third most destructive season nationwide. The California fires charred hundreds of thousands of acres, scorched California's wine country, damaged critical infrastructure, and triggered the evacuation of thousands of families throughout a number of California counties. Forty-three deaths were reported as a result of the blazes, a total that makes this series of fires the deadliest in California history.

Federal Assistance for Wildfires

FEMA is the federal government's lead agency in preparing for, mitigating against, responding to, and recovering from disasters and emergencies related to all hazards — whether natural or man-made. FEMA's primary authority in carrying out these functions stems from the Robert T. Stafford Disaster Relief and Emergency Assistance Act (Stafford Act, P.L. 100-707). The Stafford Act authorizes three types of declarations: (1) Fire Management Assistance Grant (FMAG) Program declarations; (2) emergency declarations; and (3) major disaster declarations.

Fire Management Assistance Grant Program

Section 420 of the Stafford Act authorizes FEMA to provide fire management assistance to state, local, and tribal governments for the mitigation, management, and control of any fires burning on publicly or privately owned forests or grasslands that threatens such destruction as would constitute a major disaster. FMAG funding may be used for equipment and supplies, labor costs, emergency work, pre-positioning of resources, and temporary repair of damage caused by work directly related to firefighting activities associated with the declared fire. A state initiates the FMAG process by submitting a request for assistance to the FEMA Regional Director at the time the wildfire presents a "threat of major disaster". FEMA processes the request on an expedited basis and FMAGs provide a 75 percent federal cost share with the state responsible for the remaining 25 percent of actual costs. Before a FMAG is declared, a state must demonstrate that total eligible costs for the declared fire meets or exceeds either the

³ "Statistics" from the National Interagency Fire Center, available at

https://www.nifc.gov/fireInfo/fireInfo statistics.html (Accessed March 14, 2018).

Antional Oceanic and Atmospheric Administration, "December wildfires scorch southern California in 2017."
December 15, 2017.

Statistics provided by CalFire, available at http://cdfdata.fire.ca.gov/incidents/incidents_statsevents (Accessed March 14, 2018).

individual fire cost threshold, which is applied to single fires, or the cumulative fire cost threshold, which recognizes numerous smaller fires burning throughout a state.⁶

Presidentially Declared Major Disaster

When state and local resources are overwhelmed and the "disaster is of such severity and magnitude that effective response is beyond the capabilities of the state and the affected local governments," the Governor of the affected state may request the President to declare a major disaster. FEMA's primary Stafford Act programs for disaster response and recovery in the aftermath of a major disaster are in the Public Assistance Program and the Individual Assistance Program. As part of each major disaster, FEMA also provides Hazard Mitigation Grant Program (HMGP) funds.

The Public Assistance Program, authorized primarily by Sections 403, 406, and 407 of the Stafford Act, reimburses state, tribal, and local emergency response costs and provides grants to state and local governments, as well as certain private non-profits to rebuild facilities. The Public Assistance Program generally does not provide direct services to citizens.

The Individual Assistance Program, authorized primarily by section 408 of the Stafford Act and also known as the Individuals and Households Program, provides assistance to families and individuals impacted by disasters, including housing assistance. Housing assistance includes money for repair, rental assistance, or "direct assistance," such as the provision of temporary housing.

Section 404 of the Stafford Act authorizes HMGP, which provides grants to state and local governments to rebuild after a disaster in ways that: (1) are cost effective; and (2) reduce the risk of future damage, hardship, and loss from natural hazards such as wildfires. The central purpose of this grant program is to enact practical mitigation measures that effectively reduce the risk of loss of life and property from future disasters. FEMA provides grants under HMGP to assist families in reducing the risk to their homes from natural disasters. In the case of wildfires, mitigation measures covered by HMGP include, but are not limited to: establishing defensible space measures around buildings; using fire-resistant building materials; and regularly clearing combustibles that could serve as fuel for a wildfire. FEMA provides up to 75 percent of the funds for mitigation projects under HMGP and the remaining 25 percent can come from a variety of sources (i.e., a cash payment from the state or local government).

The Case of California

On October 9, 2017, the California Governor's Office of Emergency Services (Cal OES) secured 10 FMAGs in one day from FEMA to help ensure the availability of vital resources to suppress wildfires burning statewide. The FMAGs also enable local, state and tribal agencies to recover eligible costs. FEMA issued a Major Disaster Declaration for the wildfires burning through California on October 10, 2017. The California counties of Butte, Lake, Mendocino,

⁶ "Fire Management Assistance Grant Program," Federal Emergency Management Agency Fema.gov. (Accessed March 14, 2018).

^{7 &}quot;Hazard Mitigation Grant Program," Federal Emergency Management Agency," Fema.gov. (Accessed March 14, 2018).

Napa, Nevada, Orange, Sonoma, and Yuba were all designated as eligible for assistance following the President's major disaster declaration. To date, FEMA has approved 4,475 Individual Assistance applications and obligated \$210,475,488 in Public Assistance grants.⁸

On December 8, 2017, the President issued a second Major Disaster Declaration, approving California's request for direct federal assistance to support the response to the Southern California wildfires. On January 15, 2018, the President issued a third Major Disaster Declaration allowing residents of Santa Barbara, Ventura, Los Angeles, and San Diego counties to register for disaster assistance with FEMA.

For these events, the State Operations Center is activated to coordinate resources in support of communities being affected by the fires. State, local and federal agencies work together around the clock to support emergency management efforts and provide all the necessary resources. Cal OES will request resources, such as engine strike teams, from other states via the Emergency Management Assistance Compact (EMAC), ¹⁰ as well as coordinate and collaborate with other states for additional resources.

For the Southern California Fires, Cal OES coordinated mutual aid resources of 2,700 firefighters, 611 engines and a total of 117 strike teams and task forces (24 Cal OES strike teams/task forces and 93 local government strike teams/task forces). They also managed the largest wildfire debris removal operation in California history, moving over a half million tons of debris.

Committee Leadership on Disaster Policy Reform

The Disaster Recovery Reform Act (DRRA)

On November 30, 2017, the Committee on Transportation and Infrastructure unanimously approved DRRA. The House added the DRRA policy proposals to the third disaster supplemental appropriations bill, H.R. 4667, which was passed by the House on December 12, 2017, but these policy provisions were not included in the final bill that was signed into law.

DRRA places greater emphasis on pre-disaster mitigation, and incentivizes states to invest in stronger mitigation measures helping to ensure that our communities are well-equipped to better prepare for and withstand disasters of all kinds. For every one dollar spent on mitigation activities, six dollars is saved. There is a clear return on investments in mitigation. DRRA deals directly with wildfire prevention by permanently amending the Stafford Act to allow HMGP funds to be generated from fire management assistance grants.

⁸ California Wildfires (DR-4344), "Federal Emergency Management Agency," Fema.gov. (Accessed March 14, 2018)

^{2018).}Scalifornia Governor's Office of Emergency Services, "Emergency Proclamations and Declarations."

¹⁰ EMAC is an interstate compact approved by Congress that provides an effective avenue by which states can provide one another mutual aid in the event of a disaster. Through EMAC, a state impacted by a disaster can request and receive assistance from other member states more quickly and efficiently.

viii

CONCLUSION

The 2017 wildfire season led to a record number of deaths and destroyed infrastructure throughout California and other states. The rebuilding that must be done in the wake of the fires provides an opportunity to encourage smart, resilient rebuilding, increased mitigation measures, and cost-effective federal investments. The central takeaways and lessons learned from last year's catastrophic wildfire season will help inform how to strengthen our ability to withstand disasters of all types across the Nation.

WITNESS LIST

Mr. Robert J. Fenton, Jr. Regional Administrator, Region IX Federal Emergency Management Agency

Mr. Mark Ghilarducci Director, Governor's Office of Emergency Services State of California

> Ms. Susan Gorin Supervisor, First District Sonoma County California

Mr. Eric Holly Deputy Fire Warden, Deputy Director of Emergency Services Stanislaus County, California

> Mr. Thomas Jenkins President and Chairman of the Board International Association of Fire Chiefs

IMPACTS OF THE 2017 WILDFIRES IN THE UNITED STATES

TUESDAY, MARCH 20, 2018

House of Representatives,
Subcommittee on Economic Development,
Public Buildings, and Emergency Management,
Committee on Transportation and Infrastructure,
Washington, DC.

The subcommittee met, pursuant to notice, at 10:39 a.m. in room 2167, Rayburn House Office Building, Hon. Lou Barletta (Chairman of the subcommittee) presiding.

Mr. BARLETTA. The subcommittee will come to order. Without objection, the Chair is authorized to declare a recess at any time.

Before we begin, I ask unanimous consent that Members not on this subcommittee be permitted to sit with the subcommittee at today's hearing and ask questions. Without objection, so ordered.

The purpose of today's hearing is to explore the lessons learned from the catastrophic 2017 wildfire season that led to a record number of deaths and destroyed land and critical infrastructure throughout 10 Western States, especially California.

First and foremost, our thoughts and prayers are with all those who have been and continue to be impacted by these wildfires, as well as their fellow Americans working to restore vital services to the affected communities.

As the subcommittee with primary jurisdiction over the Federal Emergency Management Agency, it is our responsibility to hear from FEMA and State and local emergency managers, including fire departments, who led the response to and are driving the recovery from the fires.

Unfortunately, 2017 was marked by many major disasters, and while there has been focus on Hurricanes Harvey, Irma, and Maria, 2017 also included one of the worst wildfire seasons in United States history.

Nationwide, over 66,000 wildfires burned over 9.7 million acres of land. In California alone, some 7,000 wildfires burned through over a half-a-million acres of land, an area larger than the size of New York City and Philadelphia combined.

The 2017 wildfire season was the most destructive and costliest for California in its history, and the third most destructive season nationwide.

It is imperative that we address the destruction caused by the 2017 wildfire season and work to inform long-term policy solutions while highlighting the importance of mitigation and resiliency.

On November 30, 2017, the committee unanimously approved legislation I introduced, the Disaster Recovery Reform Act, on a bipartisan basis because of the good work that began here with this subcommittee.

This legislation incorporated key provisions included in the SMART Rebuilding [Supporting Mitigation Activities and Resiliency Targets for Rebuilding] Act introduced by Chairman Denham. I want to thank Chairman Denham for his leadership on this issue.

The focus of DRRA and the SMART Rebuilding Act is to place emphasis on predisaster mitigation to help ensure that our communities are well equipped to withstand disasters of all kinds.

There is a clear return on investment for mitigation. For every

\$1 spent on mitigation, the taxpayer saves \$6 to \$8.

The rebuilding that must be done in the wake of these wildfires provides an important opportunity to encourage smart, resilient rebuilding, increased mitigation measures, and cost-effective Federal investments.

It is my hope that an examination of last year's wildfire season will help inform how to strengthen our ability to withstand future disasters of all types across the Nation.

I want to thank you all for being here today. I look forward to

hearing from you on this important issue.

I would like to welcome our new ranking member of the subcommittee, my friend and colleague, Ms. Titus. I look forward to working closely with you.

I now recognize Ranking Member Titus for a brief opening state-

ment.

Ms. TITUS. Well, thank you very much, Mr. Chairman. As you mentioned, this is my first hearing in the position of ranking member of this subcommittee, and I am very excited to be part of it and look forward to working with you and the other Mambars.

look forward to working with you and the other Members.

I would also like to point out that we have a visitor with us who is a valued colleague, not a member of the committee but someone whose district is greatly affected by the topic we are going to be discussing, Mr. Salud Carbajal from California's 24th Congressional District. He represents Ventura, Santa Barbara, and San Luis Obispo, where they had the largest fire in California, and I would like to welcome him and appreciate his input.

I represent a neighbor of California, Nevada, in fact the heart of the Las Vegas Valley, and like the other States, Nevada is at risk of many natural disasters. We have earthquakes, wildfires, severe winter storms, and floods. So, addressing these matters is very im-

portant to my constituency.

We do not see it as a Democratic or a Republican matter but as something that we as a Nation need to invest in, make a commitment to, so our communities can be more prepared and resilient.

This committee has operated in that bipartisan fashion, and I thank the chairman for that. We need to work together on the issues that impact the health, safety, security, and welfare of all our constituents.

Today's hearing on wildfires is extremely timely, because we are seeing natural disasters like wildfires happen much more frequently, with increasingly costly impacts. So, the Federal Government needs to take wildfires seriously.

My own State of Nevada has experienced wildfires so severe that we have called upon FEMA for additional resources through the Fire Management Assistance Grant Program for fire suppression assistance seven times over the last 2 years alone.

These wildfires have caused devastating losses to communities, and they have destroyed landscapes that can lead to flash flooding

and mudslides, and that creates even further disasters.

For example, the 2013 Carpenter fire just outside of Las Vegas, at Mount Charleston, led to severe flash flooding. It destroyed homes, businesses, wildlife habitat, and endangered the lives of residents and first responders.

Benjamin Franklin said that an ounce of prevention is worth a pound of cure, and nothing could be further from the truth when it comes to dealing with wildfires. So, we need to invest in mitiga-

Unfortunately, I do not think our President has taken this mitigation seriously. If you look at FEMA's Predisaster Mitigation Program budget, we see a proposed \$39 million, but that's a \$61 million cut from the current levels. That is not the way that we should be moving. We should be going in the other direction.

The chairman and I agree on this need for mitigation investment. In fact, just last week, we joined nearly 80 of our colleagues urging the Appropriations Committee to support the Predisaster Mitigation Program. We just can't continue this ex post facto policy

of borrowing.

Apart from the budgetary issues, I would like to also hear today about how technology such as unmanned aircraft is playing an increasing role in our detection, monitoring, and response to fires,

and how FEMA is working on that.

Much of this research is playing out again in Nevada, which is one of the test centers for drone technology. We also have the Nevada Seismological Lab at UNR [University of Nevada, Reno] with their ALERTWildfire Program, so I would be interested in hearing more about what you're doing there.

So, I look forward to learning more from our witnesses. I welcome them. We know that wildfires do not recognize boundaries, whether it is between States or communities. It should be a Federal issue. They cross over invisible lines. If we fail to address these kinds of issues, we will be missing an opportunity here.

So, thank you all for coming, and I look forward to learning a lot this morning.

I yield back.

Mr. Ferguson [presiding]. Thank you.

It is now my pleasure to recognize the ranking member of the full committee, Mr. DeFazio, for 5 minutes.

Mr. DEFAZIO. Thank you, Mr. Chairman.

This obviously is an extremely important topic, particularly as regards fire to those of us who live in the Western U.S. My home State had 664,000 acres burned last year. We have had \$454 million on attack and extinguishing and some very preliminary restoration activities, and obviously, I don't think things are going to get better. We are having a very low snow pack this year, and with climate change, which some of us believe in, it is going to get worse.

Now, we have a study, and you know, we do a lot of stuff around here that just does not make one iota of sense. So, we have a natural hazard mitigation study, that interim report, 2017. We save \$6 post-disaster for every \$1 of predisaster funds that FEMA invests. I am not going to say "spends," because these are investments, and yet, the staff of the President—I am sure he hasn't seen any of this—have proposed to cut that funding to \$39 million.

Now, they can say the deficit is \$61 million smaller because we cut this wasteful program, except if the disasters happen, and they will, and using that same formula, we just have a paper savings of \$61 million and the actual cost would be over \$360 million to the

taxpayers of the U.S.

Now, the difference is we come up with a phony budget and this omnibus thing being negotiated behind closed doors—who knows what we will get for predisaster in there, but then when a disaster actually happens, we say, oh, the rules—they don't count. We are just going to borrow the money and we will do it afterwards.

So, you can be fiscally responsible by cutting a program that can save a hell of a lot of money, potentially save lives, save property, but then, in the end, you are going to spend more, but that doesn't count, because we did that off budget with a supplemental emer-

gency appropriation. Boy, is that dumb.

We do other dumb things. We require that the U.S. Forest Service and BLM [Bureau of Land Management] pay for their own fire-fighting. Every year, they exhaust those budgets. Every year, they then begin to reduce other outlays for the fiscal year, including fuel reduction mitigation measures that they would take, leading us to more intense fires in the future, but somehow Congress, in its wisdom, has decided that floods, tornadoes, earthquakes, windstorms, et cetera, et cetera—those are all natural disasters that would go via FEMA and ultimately be paid for through an emergency supplemental, but nope, not forest fires, nope, they don't count.

No matter how big, no matter how catastrophic, no matter what the losses—I haven't even seen—we will probably hear a number today from the Honorable Gorin about what the total losses are, I mean many billions of dollars, in addition to the lives lost. We have got to start making a little more sense around here, and hopefully,

today will help lead us in that direction.

Thank you, Mr. Chairman.

Mr. FERGUSON. I would like to thank the ranking member.

Now, I am pleased to welcome our panel of witnesses today. I want to thank each of you for being willing to come and testify here, and at this time, I would like to call on Representative Denham to introduce our first witness.

Mr. DENHAM. Thank you, Chairman Ferguson. I also want to thank Chairman Barletta and his continued leadership on these issues, and I want to thank and welcome Mr. Holly, deputy fire warden and deputy director of Emergency Services for Stanislaus County, California, my district.

Mr. Holly brings with him 28 years of experience in fire service, most notably in coordinating the responses to and resources for large wildfire incidents, not only in the Central Valley but across

our entire State.

It is people like Mr. Holly on the ground that are the backbone of our response capabilities, and the coordination that we have between county and local jurisdictions makes us all much safer as a State.

With the devastation that was caused by the 2017 wildfires, it is critical that we ensure our first responders and emergency man-

agers have the support that they need.

I know all too well, serving as chairman of this committee, how critical the issues of disaster preparedness, response, recovery, and mitigation are to survival of our communities and how frustrating I hear from each of you having to cut through redtape at a time of a disaster.

That is why I was committed, in the wake of Hurricane Sandy back in 2013, to putting together key reforms to help speed up and streamline the recovery costs and reduce the costs, as well, and it is those exact reforms we passed in 2013 and made significant changes to the Stafford Act which actually helped us with the devastation that we saw last year.

In November, we also saw an increase in incentives for mitigation. I introduced H.R. 4455, the SMART Rebuilding Act. We have got to be better prepared as we move forward. As we have seen in Mr. Carbajal's district, not only has his community been devastated by fires, but now, certainly facing the challenges of floods and mudslides, we need to make sure, as we are looking across the State and across the country, that we are better prepared with smart building codes and prepared for the different disasters that can hit us across the country.

This was included as part of the budget agreement and now signed into law in February. The policy will improve the resilience of homes and businesses from fires and secondary events like floods and mudslides.

There is much more we can do, not only focused on disaster mitigation but also predisaster mitigation. We need to continue to push FEMA to streamline and simplify its disaster assistance programs.

You have heard from this committee many times, all disasters are local, which is why it is important for us to focus on a bipartisan level across the entire country on fixing so many of these different issues.

Mr. Holly, I look forward to hearing your testimony. Thank you for taking the long trip across the country to join us today.

Mr. FERGUSON. Now, I would like to recognize Mr. Huffman to introduce our next witness, the Honorable Susan Gorin, who is a county supervisor for Sonoma County, California.

Mr. Huffman.

Mr. HUFFMAN. Well, thank you, Mr. Chairman, and thanks, also, to our ranking member, Mr. DeFazio; our new subcommittee ranking member, Dina Titus; and all the Members who are here today for this important conversation, including our colleague, Salud Carbajal, from Santa Barbara.

This committee has done good bipartisan work, especially the Disaster Recovery Reform Act, and so, I am glad we have a hearing today that will continue us moving forward with this momentum, hopefully seeing that bill through to passage, and toward that end,

it is my great honor to introduce to the committee Sonoma County

Supervisor Susan Gorin.

This committee knows about the wildfires that devastated northern California last fall. From the Redwood Valley and Potter Valley complex fires in Mendocino to the Pocket fire in Geyserville, Tubbs fire in Santa Rosa, the communities I represent were devastated by these tragedies, and the witness we are going to hear from, Supervisor Gorin, will speak not just to the topline numbers we are all familiar with—5,000 homes lost, things like that. Her own home was one of those homes swept through by the fire, and so, she is here to tell us, 5 months into the difficult process of rebuilding and recovering, how it is going from a firsthand perspective, what it means to a local community, what it means to local governments struggling to make ends meet in the wake of a disaster like this.

Supervisor Gorin has been living in Sonoma County since 1982. She is very much a product of our local colleges—Santa Rosa Junior College, Sonoma State University, and was elected to the Board of Supervisors in 2012. She is a great colleague of mine, and I am delighted that she was able to take the redeye and join us on the

difficult journey east.

Susan, welcome to Washington. Thank you for your testimony

today

Mr. FERGUSON. Today we are also joined by Mr. Robert Fenton, Jr., the Regional Administrator for region 9 with the Federal Emergency Management Agency; Mr. Mark Ghilarducci, director of the State of California's Office of Emergency Services; and Fire Chief Thomas Jenkins, president and chairman of the board of the International Association of Fire Chiefs.

I ask unanimous consent that our witnesses' full statements be

included in the record. Without objection, so ordered.

For our witnesses, since your written testimony has been made part of the record, the subcommittee would request that you limit your oral testimony to 5 minutes.

Administrator Fenton, you may proceed.

TESTIMONY OF ROBERT J. FENTON, REGIONAL ADMINIS-TRATOR, FEDERAL EMERGENCY MANAGEMENT AGENCY; MARK GHILARDUCCI, DIRECTOR, GOVERNOR'S OFFICE OF EMERGENCY SERVICES, STATE OF CALIFORNIA; HON. SUSAN GORIN, FIRST DISTRICT SUPERVISOR, SONOMA COUNTY, CALIFORNIA; ERIC W. HOLLY, DEPUTY FIRE WARDEN/DEP-UTY DIRECTOR OF EMERGENCY SERVICES, STANISLAUS COUNTY, CALIFORNIA; AND FIRE CHIEF THOMAS JENKINS, PRESIDENT AND CHAIRMAN OF THE BOARD, INTER-NATIONAL ASSOCIATION OF FIRE CHIEFS

Mr. Fenton. I want to start off by thanking Chairman Barletta for having this session today, and thank you, Congressman Ferguson, Ranking Member Titus, and other distinguished members of the subcommittee.

My name is Robert Fenton. I am the Regional Administrator for

FEMA region 9, located in Oakland, California.

It is my pleasure here today to discuss with you FEMA's experience with wildfire operations and discuss how we plan for and mitigate against the growing risk from wildfires.

We used to think fire season ran from spring through early fall. However, in recent years, we have seen that is no longer the case. Fire season is now all year long, taxing the wildfire system, the agencies that make up the Nation's emergency management system, and the communities that are threatened by fires.

As we saw in recent disasters, wildfires that affect concentrated urban populations such as Santa Rosa and Ventura, California, can stress the emergency management capabilities and cause catastrophic damage.

Let me share a few statistics compiled by my colleagues at the California Department of Forestry and Fire Protection that high-

light the changed fire risks.

The years between 2012 and 2015 were the driest period in California's history. In sharp contrast, the following winter of 2016 was one of the wettest periods.

The winter fostered excessive vegetation, which grew into kindling but did not change the overall dry conditions in the forests and watersheds.

In 2017, more than 9,000 fires burned approximately 1.2 million acres of land, well ahead of the 5-year average.

While 2017 has ended, the impacts of the unprecedented fire season will continue for years to come. The question I am sure you are asking yourselves is how can we plan for this type of disaster in the future? The wildfire season has reinforced what we know. Building more resilient communities is the best way to reduce risks to people, property, public budgets, and the economy.

I cannot overstate the importance of focusing on investing in mitigation before disaster strikes. Developing capacity before an incident occurs reduces the loss of life and economic disruption.

When communities are impacted, we want to see rebuilding that is safer, smarter, and stronger, but there are significant challenges that property owners and communities face in pursuing resilience.

For that reason, FEMA Administrator Long is calling for a change in the cycle of opportunity, to move mitigation investment to the front of the disaster cycle, not at the end, where it typically lies

FEMA is working with Federal, State, local, Territorial, Tribal, and private sector partners to help align predisaster and post-disaster mitigation investments to more effectively reduce disaster loss and increase resilience.

FEMA manages the Hazard Mitigation Grant Program, the Flood Mitigation Assistance Grant Program, and the Predisaster Mitigation Grant Program that funds projects such as seismic retrofits, defensible space, safe rooms, and risk reduction for utility and other infrastructure.

These funds play a critical role in building resilient communities by reducing the risk of future disaster loss. Effective wildfire mitigation projects include defensible space measures, ignition-resistant construction, and hazardous fuel reduction efforts.

From a preparedness perspective, FEMA continues to maintain and strengthen the National Preparedness System by helping our non-Federal partners build their capabilities, which will reduce the reliance on the Federal Government in the future.

Together, we are working to achieve the National Preparedness Goal of a secure and resilient nation with the capabilities required across the whole community to prevent and protect against, mitigate and respond to, and recover from the threats of hazards that pose the greatest risk.

FEMA is focused on promoting integrated mutual aid across the whole community, continuing the development of the national qualification system for first responders, and advancing a national training and education system and a national exercise program to prepare responders and officials for disasters.

While we may never be able to completely eliminate risk, we must do our best to mitigate against it. FEMA continues to work

with communities to reach that goal.

By far, the 2017 disaster season was one of the busiest for FEMA. However, I would like to acknowledge that FEMA did not do this alone. Disasters pose many challenges at all levels of Government.

The State of California has done an extraordinary job of building the emergency management capabilities and coordinating local and State-level response and recovery efforts. Their leadership and her-

oism continue to be instrumental in helping survivors.

Additionally, we had the support of many Federal departments and agencies, including the U.S. Fire Administration, U.S. Army Corps of Engineers, U.S. EPA, and the Small Business Administration, among many others from DHS, and I would also be remiss if I did not mention the congressional Representatives in California that were personally involved in every phase of the disaster and the critical role they played.

Going forward, there are many more opportunities to work to-

gether with our partners to identify solutions.

I look forward to your questions today. Thank you.

Mr. FERGUSON. Mr. Fenton, thank you for your testimony.

Mr. Ghilarducci, you may proceed.

Mr. GHILARDUCCI. Good morning, Chairman, and members of the committee. I am Mark Ghilarducci, director of the Governor's Office of Emergency Services in California.

It is really a pleasure to be with you here today and give you some perspective on, really, the challenges that we have been faced

with over the last couple of years.

I think, to provide some context, clearly to understand that, really, California, coming out of 6 years of extreme drought conditions—and when I mean extreme, these are all record-setting conditions that have impacted the entire State of California, and within that 6-year period, having to deal with some relatively extreme wildfire activity that we saw as sort of precursors to what the potential could be if these extreme conditions continued to grip California throughout the coming years.

After the 2015-16 season where we had drought and severe fires, the conditions changed and we dealt with a lot of water, a lot of

rain at one time that ended up in catastrophic flooding.

Throughout the State, we had 52 of the 58 counties under Federal disaster declaration, and all of that flooding and that response, I put in context, because all of the resources that we have in Cali-

fornia were already tasked and taxed in responding to these various events.

The floods that we had, of course, presented and prepared for a new crop of flashy fuels that made the conditions much worse, and moving into October, then, which was later in the season, at a time when you think that things are starting to cool down and slow down, we started to get red flag or what we call fire weather conditions in the northern part of the State, which are typically very, very dangerous and don't happen that often, but when they do, perk everybody's attention, and sure enough, early in the morning on October the 8th, we had fires break out in eight different counties

The wind conditions were such that we had up to hurricane-force winds, winds exceeding 100 miles an hour, sustained for a long period of time, and in fact, in a 12-hour burning period, when it was all cleared, we had lost over 8,900 homes and businesses in a 12hour period.

This was eight counties, including the fire that came over through Napa, down into Sonoma, crossed eight lanes of improved highway, into a community that had nothing to do with the with the WUI [Wildland Urban Interface] but was in a fire corridor that resulted in the loss of over 1,000 homes just in that one community of Coffey Park.

Overall, the Tubbs fire, which is the one that—you know, one of these fires that impacted Sonoma and Napa, really surpassed what our previous large fire was in California that took a great number of homes, and that was the Oakland Hills fire in the 1990s.

Throughout this process, our Mutual Aid System was really stretched, but we do have a tremendous mutual aid capability, and while they were dealing with the cascading impacts and, really, the enormity of the northern California fires, of all of these homes and these people that had been devastated, the fire weather continued.

The extreme weather conditions that we had not seen before continued to take hold of the State and moved from a northern posture to a mid-part of the State to southern California, and on December the 10th, we had southern California—all the counties of southern California, all the way up to the middle part of the State, under

red flag conditions.

The humidity levels were in single digits, the winds were significant, and sure enough, we started getting fires that broke in Los Angeles and San Diego and in Ventura, the first one being in Ventura, which burned for many, many days and turned out to be the Thomas fire, now the State's largest fire in its history as far as acreage is concerned, and that fire, beyond burning an additional 1,000 homes in Ventura, went up into the town of Ojai, button-

hooked around that, and then came down on top of Santa Barbara.

The key thing is, above Santa Barbara and Ventura is the Los
Padres National Forest, so a lot of trees, a lot of watershed that is critical—critical—to not only being able to address the capture of rainwater when it rains but also for the environment and all the

other things that go along with that.

This fire was so hot and burned so extremely that literally it denuded the entire landscape of that Los Padres National Forest what we call the front area, and completely wiped out that area.

That then set up another dynamic that we had a rainstorm come in and it resulted in catastrophic floods and mudflows in Santa

Barbara, in Montecito, that claimed an additional 22 lives.

So, 44 lives in the northern fires, 22 lives in the southern fires and in the southern mudflow, and the requirement of all the resources that were necessary—we had over 10,000 firefighters. We had 400 local engines from our mutual aid program, 200 out-of-State engines—and I can't thank those surrounding States enough. We even brought in 33 firefighters from Victoria, Australia, under an agreement we had.

At the highest level, we established a unified coordination group, which really set the overarching priorities for coordination of this, and included FEMA, which, by the way, FEMA—we could not have done this without a great partner, FEMA, and they have been with us lockstep, and I can't say enough about all of their efforts.

Mr. FERGUSON. Thank you, sir, for your testimony. It is now my pleasure to recognize Supervisor Gorin.

You may proceed.

Ms. GORIN. Thank you so much. I want to thank the leadership of this committee and the subcommittee for their work that they have previously completed on the disasters that have faced our Na-

tion in totality.

I grew up in western Pennsylvania, but I have lived in Boston, Colorado, and certainly California. I have been prepared for horrendous snowstorms, nor easters, tornadoes, hailstorms, and earthquakes, but nothing prepared me for the devastation that I experienced in my district and in my county in October of last year.

I want to really thank all of my colleagues on this panel, because without their help every step of the way, we would not have moved forward through recovery and resiliency that we are in the place

today.

I especially want to thank Congressman Huffman and Congressman Thompson, who have been with us, and the Governor was there, and our State senators. It is very important for the local community to see that you and our local elected leaders understand what we are facing, and as you've described, in some of your districts, you do, indeed, understand what we have faced and what you have faced.

I want to deviate from my testimony a little bit. Mr. Ghilarducci really talked about the stress and strains and the magnificent performance of the mutual aid firefighters and first responders throughout the western part of the Nation and other States, and it still warms my heart when I see signs in the communities that have been ravaged by the fires to say thank you to the first responders. Without them, we would probably still be here today trying to face an uncertain future—that and the rains, the rains really helped out, and our heart goes out to Santa Barbara.

We could have been that community facing the mudslides. We were spared the torrential rains, and our army of volunteers and county organizations placed wattles everywhere around our dis-

aster areas.

As you know, that evening, the firestorms overtook Sonoma County with the ferocious winds. It was staggering to me that, almost 50 years to that date, the same patterns of fire overtook

Sonoma County, and what happened in the Hanly fire 50 years ago, took a couple of days to transport themselves across the county line and move into the neighborhoods, took less than 12 hours

to totally devastate neighborhoods.

I come to you as a supervisor but also someone, as Congressman Thompson said, lost not one but two homes, the home that I lived in in the Fountaingrove area for 20 years—that was lost—didn't own it now, but the home that I lived in in October, certainly did lose. I lost it 2 days later, and that is really talking—speaking to the long sustaining nature of the firestorms.

It just wasn't that night; it was a week and a half or 2 weeks where homes continued to burn, but CAL FIRE pulled out the maps and knew where the dozer lines were going to go and held

the line, and eventually those fires were contained.

I want to put a personal slant on it. For those who have never lost a home, you see in the debris and the ashes 45 years of life, of marriage, of family history, family photos, the ironing board sticking up in the ashes, and realizing you need to purchase every single item that you lost in the home.

It is overwhelming, both from a grief and a time perspective, and you magnify my experience and my husband's experience times 5,000 or more, and you get some scale of the needs of our commu-

nity.

Quickly, I want to really talk about community warning systems. Many of our residents lost their lives—sadly, we lost 24, but many fled their homes in terror in their bare feet. They were awakened in the middle of the night, losing power, not able to get their cars out of the garage. They lost everything, and they were so fortunate, the firefighters picked them up, and I include that the president of Sonoma State University as one of those who fled in the middle of the night.

We absolutely need robust, effective, and redundant alert systems that will not fail when the cell towers and the landlines come

down.

Secondly, disaster preparedness. Often our community members survived because their neighbors knocked on the door or telephoned their friends a couple of blocks away. We need to prepare our community, as you just talked about, for the unfolding disasters in the future.

I come from a community that is absolutely prepared. In fact, someone knocked on my door to alert me to the evacuation that night. The CERT [Community Emergency Response Team] program and the COPE [Citizens Organized to Prepare for Emergencies] program are absolutely essential in preparing a community and a population for future disasters.

Disaster mitigation. Thank you so much for your support in disaster mitigation. We have a number of requests in, because we are committed to preventing and arming ourselves with the tools to survive future disasters. They have come before; they will come in

the future.

And one final note. We desperately need funding, flexible funding for housing, and economists predicted we need 17,000 construction workers to rebuild not only the lost homes but to build the housing that we needed on the Saturday before the fire.

We need money for construction pathway programs and money to build housing to house the construction workers. This is of a scale that we have not contemplated in the past, and we are certainly painfully contemplating now and in the future.

Thank you so much for your work, and we appreciate all that you

are bringing to this issue.

Mr. FERGUSON. Thank you, Supervisor, and we appreciate your testimony.

Mr. Holly, you may proceed.

Mr. Holly. Good morning. Thank you, again, for the invitation. I'm Eric Holly, I'm the deputy fire warden and the deputy director of Emergency Services for Stanislaus County. In addition to my normal day-to-day activities, I'm also our fire and rescue operational area coordinator, as well as the Emergency Management Mutual Aid, or the EMMA coordinator for Stanislaus County.

A little bit about our county, we are in the Central Valley, the southern portion of California's Mutual Aid System, or region number four. Within Stanislaus County's operational area is the Diablo Mountain Range in the western portion, and the foothills of the Si-

erra Nevada is in the eastern portion of the county.

There are just over 500,000 people in our county. We do have 21 separate fire agencies that provide some sort of fire protection within our county. Of those agencies, some are fully paid, there are some combination departments and there are some fully volunteer agencies. Each agency will participate at some level in the California Fire and Rescue Mutual Aid System.

During the times of emergencies and disasters, I'm responsible for coordinating the local agency responses from Stanislaus County to those incidents. And as part of the California Office of Emergency Services, Cal OES, Fire and Rescue Mutual Aid System and EMMA systems, in the past years alone we've provided fire engines and individuals to wildfires statewide: from the border of Mexico all the way up to Oregon, to the State of Washington, the State of Montana, and recently, to Puerto Rico for Hurricane Maria.

We send people, from firefighters to law enforcement to emergency medical services, animal services, public works, building department, public health, and county administration departments. This year, Stanislaus County agencies continue to support the Master Mutual Aid System; however, as in years past, we have found that we've been unable to fill some of the requests that we've had.

We're only able to assist so much before we have drawdown of our own resources to exhausting levels, and we've found ourselves turning down more requests each year for that reason. Some of our agencies that have had full-time paid firefighters have had to reduce staffing and close fire stations due to lack of funding. Volunteer agencies have had trouble keeping staffing levels up for years, and what staffing they do have fluctuates with the season.

Most of our rural volunteer agencies are in agricultural areas, so during seasons like the harvest season and other specific times of the year, many volunteer firefighters are committed to their farms and ranches, and have limited capabilities to respond to calls for service within their own district, let alone being sent out to the

large wildfires.

Even with these challenges, our counties have been able to put fire equipment on the road in times of need, and when large wildfires start, county operational area coordinators, using our contiguous counties, we get together and we start pooling our resources to see what we have. And if we only have a few, we marry

them up with other resources from other counties.

Over the recent years, Stanislaus County Operational Area. which is our county, it includes our fire apparatus and individual personnel who have assisted with the operations and management of these large wildland fire incidents. At times, we don't have enough of the equipment or trained personnel in our county to fulfill those requests. And when this occurs, that's when we start reaching out to our neighbors.

We're doing all of this as the fires are beginning, as the fire weather starts to come up, and it's at that local level to do that preparedness. We continue to work locally with State and Federal agencies on mitigating local hazards through planning and edu-

cating the public, training, and exercising for all hazards.

Through Federal grant funding, we have been able to assist our nine cities within our county with mitigation planning, the goal of which is to meet those core capabilities of national preparedness. The devastation of the wildfires can cripple a community, leaving it vulnerable to secondary-type events, such as the landslides that

For our county, weed abatement and fuel reduction is an ongoing task, and each year we spend numerous hours identifying and notifying property owners of hazardous situations. It's time-consuming. We constantly struggle to keep up with the requests from the public regarding fire hazards. With all the responsibilities that our fire agencies have, they just don't have the staffing to do it on a proactive stance.

Public education has some of the same areas of concern. Staffing challenges and funding for the education programs continue to be a concern. When agencies have staffing issues for emergency re-

sponse, public education and mitigation suffers.

It's important to remember that we need to invest our money and our resources, as you said, upfront. Investment in creating emergency plans, mitigation programs, and public education will save lives, property, and the environment. Increasing staffing, or prepositioning fire equipment during Red Flag Warnings or other high-probability events likely lessen the likelihood of incidents growing into major incidents.

Our operational area did not have a major wildland fire in 2017, and it very well could have. We will. We are like many other counties, and we feel lucky that we were not affected this last year. But we continue to try to be prepared as best as we can for these inci-

dents.

Most agencies in our county have received, at some point or another, some funding through Staffing for Adequate Fire and Emergency Response Grants or the AFG Grants, the Assistance to Firefighters Grants. These have helped with communications equipment for interoperability, which has allowed our agencies to actually respond outside of our county.

We must continue to emphasize education and training to strengthen our ability to respond safely and effectively, locally and statewide to wildland fire events. Without properly well-maintained equipment, we would be unable to assist. There are many pieces of the puzzle, and without them, our statewide response would be hampered.

Thank you again for your time.

Mr. FERGUSON. Thank you, Mr. Holly.

Chief Jenkins, you may proceed.

Mr. Jenkins. Good morning, acting Chairman Ferguson, Chairman Barletta, Ranking Member Titus, and members of the subcommittee. I'm Tom Jenkins, fire chief for the city of Rogers, Arkansas. I also serve as the president and chairman of the board for the International Association of Fire Chiefs. The International Association of Fire Chiefs represents the leadership of America's fire and emergency medical services agencies.

We appreciate the opportunity to testify today about the impact of the 2017 wildfires that affected our great country. Local fire departments, many of whom you may realize were volunteer fire departments, provided nearly 80 percent of the initial attack on those fires. The IAFC is concerned about the escalating cost and damage

caused by these wildfires.

According to the National Interagency Fire Center, there were approximately 71,500 wildland fires reported last year. They burned, as we heard earlier, nearly 10 million acres. This was an increase of more than 80 percent over the amount of acreage burned in 2016. In addition, 2017 was a record year in which the Federal Government spent \$2.9 billion on wildland fire suppression. This amount was approximately 84 percent more than the \$1.6 billion spent in 2008. Our Nation cannot continue to absorb these growing costs.

We agree with the committee's interest in reducing the cost of natural disasters. The International Association of Fire Chiefs supported the Disaster Recovery Reform Act, H.R. 4460, which incentivized States and localities to take steps to mitigate the risk of disaster. For wildland fires, the IAFC supports the national cohesive wildland fire management strategy. Our association is especially focused on promoting community preparedness, improved re-

sponse capability, and, of course, mitigation.

The IAFC encourages localities to develop community wildfire protection plans. These plans identify and then mitigate wildland fire risks. They also can guide Federal hazardous fuels reduction

projects and prioritize the use of Federal funding.

The IAFC's own "Ready, Set, Go" Program is designed to promote community preparedness. It's a partnership with the USDA's Forest Service. "Ready, Set, Go" helps communities develop mitigation plans—Ready; teaches them to be situationally aware—Set; and then act early following personal wildland fire action plans—Go.

As partners with other community organizations, "Ready, Set, Go" fire departments and fire districts engage in activities including webcasts, fuel reduction, youth outreach, civic events, home assessments, and door-to-door smoke alarm campaigns. Currently, there are 1,803 "Ready, Set, Go" members in all 50 States.

An effective response is key to controlling the cost of wildfires. The IAFC believes that there is a need for well-vetted qualifications based on the National Wildfire Coordinating Group's publication, NWCG 310-1, for response staffing, and resources. However, we also support efforts to recognize prior learning and structural

firefighting skills for wildland firefighting duties.

Our association is also leading efforts to improve mutual aid agreements in the response to wildland fires. Fire departments depend on assistance from neighbors, and oftentimes other States, to assist during major fires. The National Mutual Aid System was designed by the IAFC, Intermedix, and ESRI to help departments visualize in real-time where resources are and improve decisionmaking when deploying them.

Delayed reimbursements of fire departments is an obstacle to effective fire response. The reimbursement process can take months or even years. Until reimbursement, a local fire department must do without. This delayed reimbursement cycle can reduce a fire department's ability to participate in future mutual aid requests.

The IAFC also asks Congress to continue to support mitigation activities. We ask Congress to make permanent recently passed legislation that allow States that receive Fire Mitigation Assistance Grants in fiscal years 2017 and 2018 to receive hazard mitigation assistance. This assistance will help communities reduce the risk of flooding and landslides that we saw in California in January.

The growth of wildland fire across this Nation is a clear and present danger to our citizens. America's fire chiefs look forward to working with the committee to promote community preparedness, ensure effective responses to these wildfires, and support mitigation efforts to reduce the risk of fires and ensuing floods and landslides. I look forward to answering any questions that you may have. Thank you.

Mr. FERGUSON. Thank you, Chief Jenkins, and I would be remiss if I didn't say to both you and to Mr. Holly thank you for your service as first responders and to the men and women that you serve with.

And to Supervisor Gorin, I understand, I was a mayor prior to deciding I was tired of being happy and running for Congress. But in all seriousness, it is so remarkable to me the partnerships that you have to have with your other stakeholders in there, and I know that the coordination that goes into it requires an awful lot of time and commitment.

So thank you for doing that at the local level, and let me echo some of the words of my colleagues here. I'm so, so sorry for the loss of your homes in those devastating fires. In 2017, as you know, we saw many communities and regions and entire States that were truly shattered by these natural disasters, and certainly what's happened out in California has just been absolutely devastating.

And so I think it's very important that we examine what has happened, learn from that, and then allow this body to help guide the conversation forward to make sure the local communities and States have the resources that they need not only to deal with the aftermath, but in my opinion, more importantly, deal with what happens before.

And I also want to take a minute to thank Chairman Barletta for continuing to champion this critical issue, and it's something that has been very important to him, and I think we want to recognize his leadership here.

With that, I'm going to reserve my questions for the end, and I

am now going to recognize the ranking member, Ms. Titus.

Ms. TITUS. Well thank you very much. If I could ask you, Mr. Fenton, I would like to follow up on some things that Ranking

Member DeFazio mentioned in his opening statement.

Last week when FEMA issued its 2018 to 2022 strategic plan, there was no mention of climate change, it just failed to mention it altogether. And it also removed references to climate change that had been included in the previous 2014 to 2018 strategic plan. I wonder if the administration believes that climate change is real, and how you think we can prepare for natural disasters if we don't acknowledge that it's a significant factor in the cause of those disasters.

Mr. Fenton. I represent region 9. I can't speak for either what Brock Long's beliefs are or this administration's beliefs; however, I think in my opening testimony, I testified to the part—to the extent of how fire season in California has changed over the years. And it's significantly changed, including not only the driest years on record as Mark Ghilarducci, the State director, had talked about, but also the wettest season.

So we're seeing changes in the climate in California that have caused a significant fire season, which continues—a prolonged one, which is not only seasonal anymore, but it goes year round. So we are seeing changes that are impacting California with regard to impacts on the environment, plus building into urban areas where it increases the threat and risk of homes in those areas.

Ms. TITUS. Do you think you're going to be able to do your job, or FEMA overall will be able to with the proposed about \$70 mil-

lion cut in the budget?

Mr. Fenton. Well I understand that in building a budget, there have to be priorities in building a budget. And, you know, the administration has made its decision on those priorities and where to take those cuts. Right now, I have the resources that I need in order to do my job as a Regional Administrator, both with the Disaster Relief Fund and funding I have annually to ensure that we're trained and exercised and ready to respond to disasters.

One of the areas that I think we need to focus on is how to move more of the predisaster mitigation upfront so that we could take action prior to disasters and not take action after disasters to better protect and build resiliency into the communities and infrastruc-

ture.

Ms. TITUS. Well, that, kind of, leads me to my second question. What I mentioned in the opening statement was some interest in the use of unmanned aerial systems. I'm wondering if you could comment on any barriers that exist with FEMA's budget or making the acquisition or use of those eligible for grant money, anything we can do to facilitate that, and then maybe some of our first responders could comment if that would be helpful or not.

Mr. FENTON. I'm not aware of barriers. I could get back to you in writing with regard to the specific grants and what's available

and what could be purchased. But I would say that we heavily use unmanned aerial vehicles during these fires to provide information not only during the fires, but accessed resources through Department of Defense National Guard to do things that we've never done before.

One of the things that we did is we used National Guard platforms to do assessments of the fires so we could make decisions on the declaration. Plus the firefighters used it to establish perimeters and make decisions on where to fight the fire and build defenses at.

In addition to that, we're using it right now to re-map using lidar systems to remap watersheds that were impacted from these fires and better prepare for the post-event floods that have happened down in the southern California area, and are preparing this week for the events that may happen due to the rain that's oncoming this week.

Ms. TITUS. Gentlemen?

Mr. HOLLY. Just speaking to the local level, we do have a few agencies within our county that have some UAVs. Those agencies are the paid agencies in our county. They're strictly using them now for reconnaissance on hazardous material spills as well as some of the areas that are not really wildland, where we wouldn't have aircraft working, but in large fields or in river bottom areas.

They're very much at the beginning stages of it, but they're starting to use them and they are showing some good usage with them.

Mr. Jenkins. That's an excellent question. Our association has championed the issue: We recognize that—while conventional methods to suppress fires work—that the use of technology to try to gain information, whether that's reconnaissance, is important.

But information gathering at the incident command post is only going to aid whether we're making decisions about evacuation or offensive strategy, and so we are believers in technology, specifically unmanned aerial devices, and we continue to encourage their use as appropriate by local fire departments and jurisdictions.

Ms. Titus. I would like, first, to be sure that there aren't any barriers in any of the grant programs that keep you from using those to acquire some of this technology, so maybe we can check into that

Just one other question. It's always been a concern to me about the animals in wildfires. And people often will not leave their pets, or then what do they do with their pets? I have the Animal Emergency Planning Act to try to get FEMA involved in that.

I wonder if you would talk about, Mr. Fenton, what FEMA does to encourage local communities to plan for animal evacuation or care, or how they encourage people—what to do with their pets? Because if they stay behind for the pets, not only are you going to lose the pets, you may lose the people as well.

Mr. FENTON. Following Hurricane Katrina, FEMA's done a lot of work to not only build in caring of pets and evacuation of pets into the National Response Framework, but more importantly, have worked with State and local governments to ensure that we plan for and build the capacity to be able to care for and evacuate pets

during a disaster.

California has done a remarkable job on it. I'm sure that Director Ghilarducci can talk to some of the things they did in this disaster from not only where we both went and saw firsthand where fire-fighters came to protect pets down in southern California at a zoo facility, to opening up some of their local fairgrounds to receive pets during a fire so that they could go ahead and care for them, and having that process set up beforehand so that people could move them to those locations where they would be safe.

It's important to have those plans prior to the events, and California has done a tremendous job in having those systems ready.

Ms. TITUS. I would like to see all the States encouraged to do that as well as California.

Mr. Fenton. Yes, ma'am.

Ms. TITUS. Thank you, Mr. Chairman. I yield.

Mr. FERGUSON. OK, thank you. Next, I'll recognize the gentleman from California, Mr. Denham.

Mr. DENHAM. Thank you, Mr. Chairman. Mr. Holly, you talked in your opening statement about the operational area and coordinator responses between multiple counties and strike teams.

Can you describe, from a county level, the internal decisionmaking process you go through on whether or not you are going to put equipment and teams into a different area of the State and the coordination that goes along with that?

Mr. HOLLY. Certainly. At the local level or at the operational or county level, when we hear of fires starting throughout the State, we start to coordinate within our county by making phone calls to those local fire chiefs to see their availability. A lot of it has to do with personnel, with their equipment, if it is ready to go and then the length of time that it's expected for that equipment to be gone.

As we do that, we are also in contact with our contiguous counties and talking with them to see what their availability is so that, as the orders come in, for strike teams or task forces to go out to these fires. We can piecemeal things together if we don't have enough resources. We have to look at our county. We have to look at any large incidents that might be occurring, any predicted events that may be coming up or the weather that is in our county as well, protecting what we have before we can send out more to other wildland areas.

Mr. DENHAM. Thank you. And we talk a lot in this committee about being prepared and resiliency. We passed the SMART Rebuilding Act here recently, which will incentivize important building standards as we move forward. But one of those issues is certainly the fuel that goes with the fire. That is a lot of the vegetation, a lot of the growth. I wonder if you could describe what you think could better encourage important activities on taking away some of that fuel.

Mr. HOLLY. So our county, on both sides, we have some of the State responsibility area, which is we have fire districts that partner with CAL FIRE. They have a very robust system and a program for mitigation of the fuels. A lot of it has to do with annually going in and taking down some of the new growth that comes up where you can have some high fire-prone areas.

And the center portion of our county is where most of our rural agricultural areas are. We do have some issues with weed abate-

ment throughout the year and the staffing of those voluntary agencies and getting people out to actually make contact with those agencies. It is a struggle every year, and we have seen that, you know, with the building codes that we have had and the new resolutions in California for the defensible space, it has helped. But there still needs to be more done with the public education portion of it. I believe.

Mr. DENHAM. Thank you. And Mr. Ghilarducci, I've appreciated the opportunity to work with you on some of these disasters and the quick response that we've seen from the Governor's team. One of the big questions that continues to come up as we are trying to rebuild major infrastructure, especially in the north part of the State where we've had a number of conversations about how do you get trucks in and out, debris in and out, how do you fix the bridges in a very, very quick fashion, we passed the NEPA Reciprocity Act, which not only allows for quick environmental review but allows us to streamline the process.

Now California has the opportunity to apply for section 1309 under the FAST Act. The question is will your department and the Governor take advantage of that and move to quickly expedite

those projects?

Mr. GHILARDUCCI. That's a good question. Thank you, Congressman. I think that the section 1309 is in the area that we are looking at, and we will leverage and maximize it to the advantage of the community. You know, the debris operation in the case of the

North Bay fires really was an unprecedented event.

You know, today, we've moved over 1.6 million tons of debris. In context, that's two Golden Gate Bridges, if you can get a sense of how much debris that is. And we've done that all in a period of about 5 months, which is an unprecedented work pace in addition to the work that we're doing in southern California. And the idea is to be able to get those communities as clean and clear as possible so that the rebuilding can start but not just rebuilding starting in

those areas. Have a very serious policy discussion.

Mr. Denham. Let me just—I have only got a little bit of time left. Let me be succinct about this. NEPA Reciprocity Act right now has a 2-year review process. We'd like to shrink that down to 180 days. We'd like to see if the Governor is going to be supportive of that, especially, you know, we see the Governor as supportive of waiving CEQA [California Environmental Quality Act] for football fields and, you know, we saw Pac Bell Park by a previous Governor. We waive CEQA all the time. I would think it would be very important to streamline NEPA/CEQA in the case of communities that have been devastated and we want to rebuild real quick.

Mr. GHILARDUCCI. Yes.

Mr. Denham. So it should be a very simple answer, and I would hope the Governor would work with us on changing that.

Mr. GHILARDUCCI. We are looking at that—

Mr. DENHAM. Thank you.

Mr. GHILARDUCCI [continuing]. Congressman.

Mr. DENHAM. Yield back.

Mr. FERGUSON. Thank you. Now recognize Mr. Huffman.

Mr. HUFFMAN. Thank you, Mr. Chairman. And as I look at this panel, I see this great team of firefighters, local government, Cal

OES and FEMA. And this is part of the story that I think we can celebrate as a success despite the tragedy that visited our communities. I saw many of these folks every single day during the worst of the wildfires. They work together seamlessly. The resources that were mobilized from around the Western United States with firefighters streaming in prison crews from neighboring States were impressive. There is a lot about this system that actually does work, and we are grateful for that, and we learned it firsthand.

But a lot of our—when we talk about how we can do better going forward, we do need to continue this focus on predisaster strategies. And so I want to ask our witnesses about that. And Supervisor Gorin, you did touch on the Emergency Alert System and warnings. We saw a lot of folks who lost their lives, unfortunately, in our region. And many of those were vulnerable populations, many elderly who didn't get word or even, in some cases, were trying to get out but couldn't. The power was out. They couldn't open their garage doors, and we saw folks who lost their lives in their cars, in their garages.

I'd like to hear your thoughts on predisaster planning and strategies that can help us with the evacuation of vulnerable populations. And then, also, on the telecommunications piece of this, we've seen, after these disasters—you know, we can set up wireless hotspots, mobile cell sites, charging stations, all these things that help, but what can we do to have a more robust system proactively

in advance of these things?

Ms. GORIN. This is a very astute question because that is exactly what led to the number of houses lost and the number of lives lost. We are looking at redundant and robust alert systems in the future using, perhaps, the Lake Tahoe system of very tall poles with cameras on it. We could have seen the arcing of the wires and the flash of the fires in Napa County when they first started. And we could have brought in air resources to suppress those fires at the very beginning. And this is what many counties were able to accomplish.

But the erratic winds that we experience drove those fires so fast and so furiously, quite frankly, the cloud cover was so thick that we couldn't get in. Hopefully I am describing this correctly. We couldn't get in the air support to suppress the fires. So we absolutely need the lidar and the smoke-penetrating devices to know

where the fires are and how to suppress them.

But the alert system, we know of many people who lost their lives because they were hearing-impaired. They took out their hearing aids during the night of the fire. A neighbor knocked on their door but they didn't respond. And so we not only need to acknowledge the rapid acknowledgment of a fire and bringing the resources to suppress that initially, and in many different locations because we had many fires breaking out in Sonoma County all on the night of the firestorm and then merging into two enormous fires as they went through the county over the next 2 weeks. We need to make sure that those alert systems—and thank you for your work on the alert systems and the wireless alert systems.

Some of the firefighters were so frustrated, we lost cell towers, landlines. They were ready to throw their cell phones in the fires because they could not communicate. So we need to make sure that our vulnerable populations also have the benefit of those alert systems. And just one other factoid: the Sonoma County assessor has determined that, thus far, 5,100 homes were damaged or destroyed in the fire in Sonoma County, a total loss of \$1.6 billion of assessed value.

I am missing a very important budget meeting today. We're grappling with a budget deficit in the tens of millions of dollars for the next couple of years because of our expenses and unreimbursed expenses. So anything that you can do to help not only the cities, the counties, you are absolutely right. We are working together but all of the special districts put together, including the fire districts. Thank you.

Mr. HUFFMAN. Thank you, Sue. But I am just about out of time, but I wanted to give Administrator Fenton a chance to agree with me, if he does, that the Emergency Management Performance Grant Program is a great way for FEMA to support communities like Sonoma County that are working on strategies to quickly evac-

uate vulnerable populations.
Mr. Fenton. Yes, I definitely agree. Also, I think moving more funds upfront, as I talked about earlier, will help us even before disasters to build in resiliency to communities and specifically on the IPAWS [Integrated Public Alert and Warning System] and being able to do alert and warnings and communication infrastructure, all which is critical to provide people timely information to evacuate when necessary. All those things and resources could be resolved by better planning, building better redundancy and hardening infrastructure prior to events.

Mr. HUFFMAN. Great. Thanks, Mr. Chairman.

Mr. FERGUSON. Thank you. Next, I'd like to recognize Ms. Brownley.

Ms. Brownley. Thank you, Mr. Chairman. I appreciate it and appreciate you allowing me to be here for this committee hearing. The first thing that I want to say is just a heartfelt, deep, deep, deep appreciation and gratitude to the first responders and firefighters who came to Ventura County as we were fighting this raging, raging fire. It was really unbelievable to see it and to be there. And I just can't tell you, on behalf of all the residents of my community, they are so very, very grateful.

And everyone that I speak to, even those who lost their homes, their response is always, "But we're lucky we're alive. My neighbors are alive." And certainly in the city of Ventura where a lot of the damage occurred, people have lived in that community for 20 and 30 years. And so they weren't only concerned about themselves. They were concerned about all of their neighbors as well. So I just can't overemphasize the deep gratitude my community has

for all of the first responders.

And I will just say that we had—at the height of the firefighting operation, we had 8,500 firefighters there from across the Nation, 987 engines, 27 helicopters, 58 water tenders, 153 handcrews, 80 dozers and firefighters came from Oregon, Arizona, Washington, Idaho, Montana, New Mexico, Nevada, Colorado, and Utah. And I think the thing that impressed me the most was the fact that I

know there is a system in place for firefighters nationwide when a disaster occurs. Everyone rallies.

But the fact that, at the end of the day, this is really, truly a volunteer operation. And the fact that everyone came to our calling was just amazing, and it has really impressed upon my community and the county just how grateful they are and how deep their ap-

preciation truly, truly is.

And I also want to thank FEMA and Cal OES because you were there immediately and took charge. And your swift response was just overwhelming. And, again, as we are recovering from the disaster, the community is overwhelmingly grateful to you and understands your response to the community, how quickly we have been

able to clean up the debris.

Obviously, there is a long road ahead in terms of recovery. But we are extraordinarily grateful. And I think, Ms. Gorin, your description in your own community in Sonoma is exactly the same description that I can say in both Ventura County and Santa Barbara County so thank you for that. We had a fundraising event a couple of weeks ago here in Washington for the Thomas fire. And the Friday before that, we had had 70-mile-an-hour winds here in Washington, DC.

And I was able to say to all of those—because everyone that was there was from Washington, DC, or the surrounding area. And I said, "Imagine severe drought conditions and striking a match with 70-mile-an-hour winds." And that's exactly what happened in the Thomas fires in Ventura County. And I tell you the whole room

just sort of gasped. So, thank you.

I wanted to ask Mr. Ghilarducci. So in terms of—do you have an idea, an update, on the status of California's reimbursement requests to FEMA for the firefighting and an estimate of what you

think the future costs will be?

Mr. GHILARDUCCI. Yes, good question. We do have—well, the update on the firefighting costs and what we call the emergency protective measures has been being processed. And many of those fire agencies have already been reimbursed. I am happy to say that FEMA has, you know, agreed to provide 100 percent of reimbursement for firefighting costs or those costs for protective measures.

And it is a varying level on different kinds of projects that we are working on. I was also excited to note—and much of the work of this body being able to successfully get 90 percent for debris clearance. And that was a huge benefit to the communities. And we

appreciate FEMA's engagement with all that.

Ms. Brownley. Well, thank you for that. And I, too, wanted to just underscore in terms of my opinion how important predisaster and post-disaster mitigation truly is. And when Governor Brown came to Ventura to oversee the disaster that had occurred there, when he spoke, he said, "Unfortunately, these fires are the new normal for California." And so I concur with that statement, and I think it is critically important that we invest more of our resources in that predisaster mitigation but also the post-disaster because, today, we are expecting heavy rains again in Ventura County and are evacuating people as we speak. And so that needs to be addressed. I see that my time is up but I thank you—

Mr. FERGUSON. The gentlewoman's time—

Ms. Brownley [continuing]. For your indulgence, Mr. Chairman. Mr. Ferguson. Thank you.

Next, Ms. Plaskett, you are recognized.

Ms. PLASKETT. Yes, thank you, Mr. Chairman. And thank you, Ranking Member. First, of course, like so many of my colleagues, I want to extend my thanks to you for the work that you do, not just in this last horrendous wildfire that we dealt with but all throughout the year and all the time you all are prepared and

ready to serve the people of this country.

And for that, we are most grateful that you extend not just yourselves but your families and your lives to support us and to help us. And we're all really grateful for that. You know, I think this is very interesting because the other committee that I am on is the House Agriculture Committee, which has purview over the U.S. Forest Service. In October, we reported out a bill that is subsequently adopted by the House in November, the Resilient Federal

Forests Act. So you are probably familiar with it.

Mr. Fenton, one of the things this bill would do is to change the way wildfire fighting efforts are funded, ending a process called the borrowing by allowing now Federal agencies to tap into disaster funds from FEMA when wildfire suppression budgets have been exhausted. I understand that one of the concerns with this approach—and I am wondering if you share this concern—is that since funding requests for the Disaster Relief Fund are based on a 10-year average of costs, fires could—don't kill me for the pun burn through the fund right away, and there may not be enough left for other disasters, such as tsunamis or earthquakes or hurricanes that have occurred most recently. In your view, would the way this approach works fix the issue that had been in the past, and do you share concerns that this would end up being less money for other disasters, and how would you fix this?

Mr. Fenton. Well, so let me start with right now underneath the Stafford Act. We pay firefighting costs for all fires on State and

Ms. Plaskett. Mm-hmm.

Mr. Fenton. And so all the costs for the northern California fires and a good portion of the costs for the southern California fires that were on State and local land, including all the firefighting resources regardless of local, State or Federal, that fought those fires on those lands, we are reimbursing those costs right now. So what you're talking about specifically, fires on Federal lands and to fight those fires on Federal lands, the Stafford Act was focused on helping State and local governments during events. So it would be a change from that.

And to further complicate it, as you pointed out, underneath the Budget Control Act, based on the 10-year history and the amount of funding that it would take to fight those fires on Federal lands, it wouldn't leave sufficient funding. And we'd probably be coming and asking for supplementals every month, especially if you got later into the fiscal year.

So we need to look for a way to do that outside of tapping into the Stafford Act. I think the Stafford Act has been pretty clearly, up until now, focused on supporting State and local governments. And I think that should be the continued priority, and we should look at something outside of the Stafford Act to support the U.S. Forest Service and their requirements.

Ms. Plaskett. But, now, you haven't said whether or not you agree with being able to tap into the FEMA funding in other areas is going to be beneficial for fighting fires or from—if you're putting on your hat from, you know, when you were directing FEMA, is this a concern that you would have with knowing that there may—we're talking care of firefighters from our supplemental right now, but that means we're going to have to tap into other funds elsewhere and not knowing if Congress is going to be willing to give you those supplements and to the amount that you need.

Mr. FENTON. Right. So I am not sure I fully understand your question but I think it's—if we tap into the Stafford Act-specific funds, it's underneath the 10-year average. It's kind of robbing

Peter to pay Paul.

Ms. PLASKETT. Right.

Mr. FENTON. And, therefore, we have to look for another way. And we would be happy to sit down and have a discussion. And I know Administrator Brock Long has done that and would be happy to entertain the discussions of looking for other ways to meet those requirements on Federal land.

Ms. Plaskett. Have you talked about lifting the cap on the

amount of funding that would be there?

Mr. FENTON. Well, my understanding is the cap is from sequestration and it's a cap imposed.

Ms. Plaskett. You're not supposed to say the word "sequestration" around here.

Mr. Fenton. Oh, I am sorry. So it's a—learn something every day. It's a—so the cap, as I understand it, is an imposed cap.

Ms. Plaskett. Right.

Mr. FENTON. Let me change my word here. Ms. Plaskett. It's just a dirty word, isn't it?

Mr. FENTON. Yes, it's an imposed cap that would take a change in order for that to be lifted. So it's something that we couldn't internally do on our own.

Ms. Plaskett. OK. Thank you. My time is expired. I yield back.

Mr. FERGUSON. OK. Thank you.

And seeing that we've got—do you have any more?

Mr. Garamendi has gone. OK. As said before, I'd reserve my time to ask a few questions here at the end. And I am going to kind of focus at the local level with these. First, Chief Jenkins, you kind of view things from a national level. We've heard about the disasters in California today but certainly wildfires occur in other areas of the country as well.

Give me a little bit of an idea about if you were going to design a program for mitigation, pre-fire mitigation, what would be the flexibility that you would need to be able to address, say, the concerns in California and the concerns in Georgia or western Pennsylvania or even in Arkansas? What are the things that you think local communities and local fire districts would need?

Mr. Jenkins. Well, I think the most important attribute of any effort to make our communities not only more responsive to impending disasters, specifically wildfires, but also more resilient is

that we have to be able to provide them in a framework to make it function.

And at the same time, we have to understand that at the local level, we have to be able to provide some artistic freedom for the uniqueness of the topography and sometimes the vulnerability of those populations at a local level. And so I think if we were to do something like that, we have to be able to harness an opportunity to work collaboratively with national best practices and also input from local fire and emergency management leadership.

Mr. Ferguson. OK. Mr. Holly, I was interested in the conversation about removing fuel from the surrounding areas. In Georgia, we do a lot of controlled burns. Every 3 years, you go through and manage the forest that way, make sure that they are harvested correctly. Is that something that's done? And I am just—this is for my own knowledge. Is that something that was done in this area, or is that not something that you can do because of the topography? Give me an idea of what that's like.

Mr. HOLLY. I can't speak to the Federal and to the State lands. They do controlled burns in their areas. My particular county is in the valley. We have a lot of air control issues, air quality control issues. And with that, it's very specific times of year that we can or cannot do some controlled burns on the agricultural side. But in some of the areas that are more fire-prone, it's difficult just because of the topography of our area.

Mr. FERGUSON. And so you have to go in and manually clear that? When you say that you remove debris—

Mr. Holly. Correct. In the areas that butt up against cities and towns, the property owners are responsible for clearing that. Sometimes it's difficult to find those property owners. They are from out of the area, or there has been issues where somebody has passed away, and we don't know who the right, full property owner is and trying to find someone to clean that, or we can go in and force-clean that. But then that becomes—the cost is borne by the district itself, and that can be very expensive, especially for smaller districts.

Mr. Ferguson. OK. Supervisor Gorin, you talked about the need, you know, lessons learned. You've kind of seen what's happened and wishing that you had the, as you said, the taller poles and the cameras that are looking out. From your perspective at the local level, knowing what you know now, besides the technology, what would you have done from the physical standpoint of protecting the community? What do you think would have been advantageous and knowing what you know now, looking at other communities, what do you think that that should look like?

Ms. GORIN. I really appreciate your astute questions, especially regarding how a community can prepare themselves. And vegetation management is something that we are really focusing on. We love our trees, especially me, but those eucalyptus trees that bordered my property are gone. I did work with a mountain community and a volunteer fire company on vegetation management using a chipper program and our Youth Ecology Corps that we hire atrisk youth to work with property owners to cut down the excess fuel, bring the chippers along on the roads, chip it up.

The fire agencies are not exactly thrilled with chipping because woodchips do burn, but I checked back with the board president of Mayacamas. She said we lost one out of three homes. If we had not engaged in this active vegetation management, we would have lost maybe all or most of those homes so they are grateful for that kind of program. Also-

Mr. FERGUSON. I am about to run out of time and if I—

Ms. Gorin. Yes.

Mr. Ferguson [continuing]. Could—because I've got one other question.

Ms. Gorin. Good.

Mr. FERGUSON. Physical firebreaks and fire roads, is that something that is normal practice, and do you maintain those firebreaks?

[Nonverbal response.]

Mr. Ferguson. OK. Because it's—again, me trying to understand just the severity of what these communities went through, it sounds like you are doing a lot of the right things. You are managing the firebreaks. You are removing the vegetation. You are

doing those kind of things.

Was this just such a unique event with the 70-mile-an-hour winds because it seems like some of the mitigation things were done correctly and you were being active in doing that? I make that observation that, you know, I want everybody to know that you all have been doing some of the pre-event mitigation work. And yet this was such an unusual set of circumstances with the drought and the high winds that it was just something that—it quite candidly was greater than something that we could have prepared for in many ways. Yes?

Mr. GHILARDUCCI. You are absolutely correct. The challenge that we face, though, is that these unique events are becoming more regular events and that's the delta that we're facing as public safety and the fire service and how do we address that. And part of that is how is local land-use planning done now where you have the Wildland Urban Interface intermix and how best can we look at preexisting fire conditions through situational mapping and forecasting to be able to better identify where those hazard mitigation efforts could take place.
Mr. FERGUSON. OK. Well, thank you.

I want to thank each of you for your testimony. I want to thank you for taking time to come across the Nation and share with us your perspective, your expertise, and your knowledge. So if there are no further questions, I would ask unanimous consent for the record that the record remain open for 15 days for any additional comments/information to be submitted by Members or witnesses, included in the record of today's hearing, and, by unanimous consent, that the record of today's hearing remain open until such time as our witnesses have provided answers to any questions that may be submitted to them in writing.

Without objection, it is so ordered.

Again, I'd like to thank each of you for your testimony and your time today. If no other Members have anything to add, the subcommittee will stand adjourned. Thank you.

[Whereupon, at 12:05 p.m., the subcommittee was adjourned.]

27

STATEMENT

OF

ROBERT J. FENTON REGIONAL ADMINISTRATOR FEDERAL EMERGENCY MANAGEMENT AGENCY U.S. DEPARTMENT OF HOMELAND SECURITY

BEFORE

THE

HOUSE TRANSPORTATION AND INFRASTRUCTURE COMMITTEE SUBCOMMITTEE ON ECONOMIC DEVELOPMENT, PUBLIC BUILDINGS, AND EMERGENCY MANAGEMENT UNITED STATES HOUSE OF REPRESENTATIVES WASHINGTON, D.C.

"Impacts of the 2017 Wildfires in the United States"

Submitted

Ву

Federal Emergency Management Agency

500 C Street SW

Washington, D.C. 20472

March 20, 2018

Introduction:

Good morning, Chairman Barletta, Ranking Member Titus, and Members of the subcommittee. My name is Robert Fenton, and I am the Regional Administrator for the Region IX office of the Federal Emergency Management Agency (FEMA) located in Oakland, California. Our office leads all-hazard support to the states of Arizona, California, Hawaii, Nevada, and the U.S. Pacific territories. I would like to thank you for this opportunity to discuss FEMA's role in the wildfires of 2017 and the importance of planning for wildfires and mitigating their destruction.

In 2017, over 20 million people lived in areas impacted by the wildfires that burned across more than 200,000 acres of state and private land in northern California. This, coupled with last year's historic hurricane season, tested the Nation's ability to respond to and recover from multiple concurrent disasters. Without a doubt, this was FEMA's most demanding year in its 40-year history.

These historic disasters – each historic in its own right – have compelled FEMA to push its limits. Congress entrusts FEMA to coordinate effective and efficient response and recovery missions, to provide oversight of the taxpayers' investment in these activities, and to maintain a highly regarded and well-trained cadre of employees. Today, I will share with you our Agency's experience with wildfire activities and discuss how we can support efforts of states, territories, and tribal nations to plan for and mitigate the fierce destruction of wildfires.

2017 Fire Season

Historically, fire season ran from spring through early fall. However, in recent years, we've seen that is no longer the case. Drought conditions dry fire fuels, which increases the likelihood of wildfires. Rainy conditions encourage growth of fire fuels, increasing the likelihood of wildfires. There is no ideal season that discourages wildfires. Fire season is now all year long, and that taxes the wildland fire system, the agencies that comprise the Nation's emergency management system, and the communities that fires threaten.

Last year in California, where my office is located, the wildfire season was devastating. After a summer of fires along the border with Oregon and in the central part of the state, one night in October, over 100 wildfires broke out in Northern California. During the following days, these fires destroyed thousands of homes, overturned communities, and claimed dozens of lives.

Two months later, this scenario was replicated in Southern California, resulting in two more fatalities. My colleague, Chief Ken Pimlott of the California Department of Forestry and Fire Protection, or Cal Fire, has shared the following key elements of the 2017 fire season in California.

- 2012 to 2015 was the driest period in the state in 1,200 years.
- 2016's wet winter produced an excessive grass crop (kindling) but did not change the
 overall dry conditions of the vegetation in our forests and watersheds.
- 9,133 fires burned 1.2 million acres (well ahead of the 5-year average of 4,835 fires over 202,786 acres).

- The 13-day Santa Ana wind event in December was the longest ever in recorded history.
- 2017 saw the most destructive fire (Tubbs) and the largest fire in terms of acres burned (Thomas) in the state's recorded history.
- Tragically, 2017 was also the deadliest year for wildfires on record in California.

While 2017 has ended, the impacts of the unprecedented fire season will continue for years to come. The increased and enduring flood risks after fires are very real. In January 2018, Southern California witnessed devastating floods and debris flows that took an additional 21 lives and damaged homes, commercial properties, and infrastructure. Communities that burned last year are now working to stabilize burned areas, prevent erosion and mitigate flood risks that follow fires.

Resources to Fight Wildfires

When wildfires occur, the local first responders—county, state, and federal firefighters—lead the firefight. If a wildfire progresses to the point where it threatens such destruction as would constitute a major disaster, the state can request and FEMA can approve a Fire Management Assistance Grant (FMAG). FEMA reimburses 75 percent of eligible state, local, and tribal firefighting expenses in the following areas: field camps, equipment use, materials, supplies, and mobilization and demobilization activities attributed to fighting the fire. The intent of the FMAG is to provide supplemental funding so the firefighters can concentrate on extinguishing fires and not worry about how firefighting resources will be financed. Moreover, the program is designed to prevent major fires from becoming major disasters.

If a wildfire continues out of control after a FMAG has been approved and results in significant needs that cannot be addressed by an FMAG, a governor may request that the President declare an emergency or major disaster. An emergency declaration allows FEMA to provide direct federal assistance and resources to the firefight. With a major disaster declaration, the President may authorize a broader array of assistance, including through the Individual Assistance Program (IA), the Public Assistance Program (PA), and the Hazard Mitigation Grant Program (HMGP). This escalation from FMAG to major disaster declaration occurred in response to the October and December 2017 fires. For the latter, first FEMA approved a series of FMAGs, the President then declared an emergency in order to authorize direct federal assistance to aid firefighting operations, and, subsequently, he declared a major disaster, which ultimately authorized IA, PA, and HMGP.

Buying Down Risk through Preparedness and Mitigation

Building more resilient communities is the best way to reduce risks to people, property, and taxpayer dollars. I cannot overstate the importance of focusing on investing in mitigation before a disaster strikes. The most critical tools are managed at the community level and involve zoning, planning, code adoption and enforcement, risk-based insurance pricing, and development decisions that balance disaster resilience and economic realities.

Developing resilience capacity before an incident reduces loss of life and economic disruption. When communities are affected, we want to see rebuilding that is safer, smarter, and stronger, but there are significant challenges that property owners and communities face in pursuing resilience.

For that reason, FEMA Administrator Long is calling for a change in the cycle of opportunity: to move mitigation investment to the front of the disaster cycle, not at the end where it typically lies.

The National Institute of Building Sciences' (NIBS) Multi-hazard Mitigation Council (MMC) estimates that for every dollar FEMA invested in mitigation between 1993 and 2016, society as a whole saved six dollars due to reduced future losses. According to research conducted by the MMC over the past year, mitigation programs saved the American public an estimated \$15.5 billion dollars by building new construction beyond code requirements, and \$158 Billion in savings from federally funded mitigation grant programs, funded from 1993-2016.

Through the Mitigation Framework Leadership Group (MitFLG), FEMA is working with federal, state, local, territorial, tribal, and private sector partners to help align pre- and post-disaster mitigation investments to more effectively reduce disaster losses and increase resilience. FEMA also manages the Hazard Mitigation Grant Program (HMGP), the Flood Mitigation Assistance (FMA) grant program, and the Pre-Disaster Mitigation (PDM) grant program; these programs fund projects such as seismic retrofits, defensible space, safe rooms, and risk reduction for utility and other infrastructure. These funds play a key role in building resilient communities by reducing the risk of future disaster losses. Wildfire mitigation projects can include:

- Defensible space measures: creating perimeters around residential and non-residential buildings and structures through the removal or reduction of flammable vegetation;
- Ignition-resistant construction: applying non-combustible building envelope assemblies, using ignition resistant materials, and using proper retrofit techniques in new and existing structures; and
- Hazardous fuels reduction: vegetation management to reduce hazardous fuels, vegetation
 thinning, and the reduction of flammable materials to protect life and property beyond
 defensible space perimeters but proximate to at-risk structures.

HMGP is available to a state following a major disaster declaration, if authorized as part of that declaration, and its funding level is based on the costs associated with that disaster. Each year, we receive more PDM and FMA applications than we are able to fund. From FY 2003-2016, FEMA received PDM grant applications requesting a total of \$3.4 billion. Of the \$3.4 billion, FEMA has awarded and closed \$914 million in mitigation applications with \$31 million remaining pending award. From FY 2013-2016, FEMA received FMA grant applications requesting a total of \$1.2 billion. Of the \$1.2 billion, FEMA has awarded and closed \$53 million in mitigation applications with \$189 million remaining pending award. Wildfire mitigation including defensible space, ignition-resistant construction, and hazardous fuels reduction are eligible projects under HMGP and PDM. To the extent wildfires create flood risk, FMA-funded projects can address that risk.

In the Bipartisan Budget Act, Congress authorized FEMA to provide HMGP funding for FMAGs authorized in fiscal years 2017 and 2018, regardless of whether a major disaster declaration was declared, in areas where FMAG assistance was provided. With 62 FMAGs approved last year, this will deliver millions of dollars in additional mitigation dollars to state, local, tribal, and territorial partners. FEMA is developing guidance to implement this new, time-limited authority. I am hopeful but also mindful of three major challenges related to mitigation projects: time,

complexity, and cost-share. It can sometimes be challenging for communities to focus on mitigation opportunities immediately following a disaster, when the focus is on response and the immediate recovery. In addition, since there are often several mitigation solutions that could be implemented, these projects can take time to develop and evaluate, and meeting the cost-share requirement takes resources that communities may not have immediately post-disaster.

From the preparedness perspective, FEMA continues to maintain and strengthen the National Preparedness System by helping our non-Federal partners build their capabilities, which will reduce their reliance on the Federal government in the future. Together, we are working to achieve the National Preparedness Goal of a "secure and resilient nation with the capabilities required across the whole community to prevent, protect against, mitigate, respond to and recover from the threats and hazards that pose the greatest risk." Our team is currently focused on promoting integrated mutual aid across the whole community, continuing the development of a National Qualification System for first responders, and advancing a National Training and Education System and National Exercise Program to prepare responders and officials for disasters.

FEMA, however, is just one part of the team. During a disaster, citizens in the impacted communities also become the "first responders." We need to build a culture of preparedness, empowering individuals with life skills to help speed the response and recovery efforts.

Do they know how to shut off water and gas? Do they check on their neighbors? Do they know CPR? Are they financially prepared to deal with the impacts of disasters in their communities, including having the right insurance for the disasters they face – be they flood, earthquakes, tornadoes, wildfires, etc.? Do they have some modest level of savings to allow them to miss a few days of work without ending up in financial ruin?

Developing resilient communities ahead of an incident reduces loss of life and economic disruption. When communities are impacted, they should ensure that they rebuild infrastructure better, tougher, and stronger to protect taxpayer investment and promote economic stability. FEMA is exploring ways to incentivize investments in mitigation that reduce risk, including predisaster mitigation, to help reduce disaster costs at all levels.

While we'll never be able to eliminate risk, we must mitigate risk. FEMA will work with communities and insurers to close the insurance gap across the nation. Building a culture of preparedness will ultimately help people and communities recover faster following disasters, including wildfires, reducing the overall cost for taxpayers.

Next Steps and Conclusion

At FEMA, we seek constant improvement to support America's disaster survivors, citizens, first responders, and communities. Responding to and recovering from any disaster is a whole community effort that relies on the strength of federal, state, local, and tribal governments and non-governmental entities and individuals, in addition to FEMA. The unprecedented events of this past fall are no exception.

The 2017 wildfire season was one of the busiest for FEMA. We look forward to collaborating with Congress in the coming months to implement lessons learned, as well as gather any additional

feedback that you may have. I look forward to your questions. Again, thank you for the opportunity to appear before the Committee today.

EDMUND G. BROWN JR. GOVERNOR



Mark Ghilarducci Director, California Governor's Office of Emergency Services Governor's Homeland Security Advisor

STATEMENT FOR THE RECORD

Before the United States House of Representatives Committee on Transportation and Infrastructure Subcommittee on Economic Development, Public Buildings, and Emergency Management

Impacts of the 2017 Wildfires in the United States

Tuesday, March 20, 2018

2167 Rayburn House Office Building Washington, DC

3650 SCHRIEVER AVENUE, MATHER, CA 95655 (916) 845-8506 TELEPHONE (916) 845-8511 FAX

Introduction

Chairman Barletta, Ranking Member Titus, and members of the Subcommittee on Economic Development, Public Buildings, and Emergency Management. Thank you very much for the opportunity to address the Subcommittee on what ended up being one of the worst fire seasons in California history.

The California Governor's Office of Emergency Services (Cal OES) oversaw the coordination of response and recovery efforts for the devastating 2017 wildfire season, and as Director of Cal OES it is my responsibility facilitate and effective response and aid in enhancing future response efforts by considering the lessons we have learned. The fire season in California has become almost year-round, stretching the resources of local, state, and federal public safety agencies. As we evaluate how we can better prepare for future events and mitigate any future damages, it is important to recognize the vital assistance and close coordination provided by the Federal Emergency Management Agency (FEMA) and the federal government. The continuing strong partnership between local, state and federal agencies and offices is essential to saving lives and property in the disasters to come.

This testimony will focus on response and recovery to the 2017 wildfires, including lessons learned, and recommendations for the future to mitigate damages, increase preparedness, and aid first responders.

The 2017 California Wildfires

Beginning on October 8, and following into October 9, 2017, over 100 wildfires broke out in Mendocino, Solano, Sonoma, Napa, Yuba, Butte, Nevada, and Orange counties. The most destructive fire in California history, the Tubbs Fire, caused massive devastation to the City of Santa Rosa and its outlying communities, destroying 8,900 structures. Only two months later, a second series of fires began in Southern California, assisted by a delayed and extended Santa Ana wind event. The Thomas Fire spread across Santa Barbara and Ventura counties and became the largest blaze in California history, engulfing more than 280,000 acres over the course of a month. This past year, 46 people perished in the Northern and Southern California wildfires, with an additional 20 confirmed fatalities in the subsequent Montecito mudslides in January 2018.

The October and December fires were simply a crescendo to an already long and exhausting fire season. Over the course of 2017, a total of 9,133 fires scorched an estimated 1.24 million acres of land across the state. The lack of precipitation between 2012 and 2015 represented the driest seasons in California history, with a state-declared drought emergency in effect from 2014 to 2017. The drought exacerbated fire conditions by increasing dry, vegetative fuel availability. The record rainfall of 2016 and 2017 did little to curb these dangerous conditions, and caused excessive crop and overgrown brush that served as kindling for following wildfires. On the night

of October 8, some Northern California regions experienced winds of 50 miles per hour, with gusts of 79 miles per hour reported in Sonoma County. The ferocity of the northern California fires was the product of weather patterns that are becoming more common, and contributed to a perfect confluence of factors that ultimately caused the destruction of entire communities.

Coordinating Rapid, Effective Response

Almost immediately after these wildfires began, it became clear that additional resources would be necessary to supplement local firefighting efforts. Cal OES, through the State's Mutual Aid System and through the activation of the National Emergency Management Assistance Compact, worked to provide rapid and systematic mobilization, organization, and operation of fire, law enforcement, and other emergency services, including thousands of National Guard air and ground assets. The response to these events was a massive undertaking and incorporated assets from local, state, federal, private sector, and even international agencies. Through a memorandum of understanding between Cal OES and the State of Victoria, Australia, California also received assistance from over 30 Victoria firefighters. Over 400 state and local government and 200 out-of-state fire departments sent engines, crews, overhead, pickup trucks, and air assets to the October and December wildfire complexes.

As was the case during the 2017 Oroville Dam emergency, California activated a Unified Coordination Group (UCG) on the first day of the October wildfires to lead the overall coordination of the response and recovery efforts. The UCG operates out of the State Operations Center and is comprised of members of the Governor's cabinet, leadership from the Governor's Office, Cal OES, CAL FIRE, the California Highway Patrol, California Department of Transportation, California Health and Human Services Agency, California Department of Food & Agriculture, and other key state agencies with statutory authorities for public safety and property protection. FEMA is a cornerstone member of the UCG as well. As the emergency is unfolding and decisions are being made rapidly, having FEMA at the table with state agencies early allows for close coordination and has proven to help California streamline and receive the rapid assistance it needs.

Debris Removal

Recovery efforts to remove disaster-related debris from these disasters are unprecedented in scale. This massive undertaking represents the single largest debris removal project in California since the 1906 San Francisco Earthquake and Fire. To date, over 1.6 million tons of debris has been removed from affected areas in Northern California, which is approximately the same weight as two Golden Gate Bridges. This has been accomplished through a close coordination between the U.S. Army Corps of Engineers (USACE) and the California Department of Resources, Recycling, and Recovery (CalRecycle) which performed debris removal in two distinct branches. USACE managed debris removal operations in Mendocino, Lake, Napa, and Sonoma counties, while CalRecycle managed operations in Butte, Yuba, and Nevada counties.

In Southern California, private property debris removal stands at about 60 percent complete with 289 parcels remaining to be cleared. Local agencies in Santa Barbara, Los Angeles, and San Diego counties, in conjunction with CalRecycle operating in Ventura County, are removing debris from public rights-of-way property and repairing infrastructure damaged by debris flows. At the request of the state, USACE enacted scaled programs to clear massive debris basins and waterways in Ventura and Santa Barbara counties. The continuing debris removal mission across in California exemplifies the cooperation between local, state, and federal agencies. At this crucial juncture, removing disaster debris is critical in enabling survivors of the fires to move forward and begin a path to recovery.

The partnership between USACE and the State of California has exposed opportunities for future growth and examples of best practices in large-scale debris removal operations. In the immediate aftermath of the Northern California fires, objectives of mutual interest communication between the state and USACE was challenged by process and contracting differences between the agencies. The Incident Command System (ICS), a foundational principle of command and control in emergency management, was not utilized by USACE to organize at the field level. Given the large number of contractors and subcontractors involved due to the complexity of the debris removal operations, ICS was necessary to elevate and solve problems quickly with a singular point of contact. Limitations on the span of control within ICS force effective and efficient communication between organizational hierarchies. With the help of CAL FIRE, USACE was able to successfully transition to an ICS organizational model at the field level. As a result, the efficacy of operations was instantly increased. In future operations, it would benefit USACE to operate in an ICS model pursuant to the National Incident Management System (NIMS), which is based on the Standardized Emergency Management System (SEMS). As a comprehensive national model of incident management required of federal agencies, adherence to NIMS would greatly improve USACE's ability to integrate itself with partner agencies.

Debris removal is a vital first step in allowing communities to rebuild after disasters. During the initial debris removal phase in Northern California, USACE required operational decisions to be fed up a chain of command to the Washington, D.C. headquarters. This elongated decision structure delayed important decisions related to hazardous materials and contractual issues where urgent response was needed to protect public health. Organizational bureaucracy prevented USACE on the ground from rendering immediate decisions and field staff were only able to offer educated guesses on the outcome of problems until they were sent up the full chain of command. To quickly and effectively address urgent emergency management issues, USACE should delegate authority to their leadership on the ground.

However, the recovery process for both wildfire events also highlighted successes in the partnership between Cal OES and USACE. California has heightened safety laws and environmental standards for debris removal. USACE was very receptive to California's strict

adherence of these standards, and actively worked to meet them. Further collaboration between the United States Environmental Protection Agency (USEPA) and its state counterparts, the California Environmental Protection Agency and the California Department of Toxic Substances Control, resulted in effective and efficient initial sweeps of household hazardous materials due to enhanced coordination and agreement on adherence to these California standards.

There were debates in the field about ground-level policies and procedures, but these were able to be resolved amicably with compromise. For example, Personal Protective Equipment (PPE) standards vary between federal and state agencies. Where the state deemed these PPE requirements unnecessary and even dangerous to operational safety, the state and federal agencies were able to conclude the application of PPE requirements depended on individual circumstances. This flexibility and rationality between partner agencies fostered greater cooperation and allowed for rapid clean-up of hazardous household waste.

Individual Assistance and Small Business Administration Disaster Loan Programs

In coordination with local jurisdictions, Local Assistance Centers (LACs) were established to assist victims in navigating the recovery process and to obtain state and federal resources. Strategically placed throughout affected areas in Northern and Southern California, LACs offered in-person support to individuals and business owners in areas designated for Individual Assistance (IA) programs by the Presidential Major Disaster Declaration. Recovery specialists from the Department of Motor Vehicles, Department of Insurance, Contractor State Licensing Board, FEMA, the United States Small Business Administration (SBA), and other local government and private and community nonprofit organizations were represented at the LACs to disseminate programmatic information and provide application-filing assistance. Cal OES developed a website to assist individuals, businesses, and local government in finding information on applicable programs and contacts, and inform the community of major updates and events.

As it has in numerous past disasters, the state encountered a significant road block in rapidly obtaining a declaration for the SBA Disaster Loan Program. SBA policy prohibits the SBA from authorizing the Disaster Loan Program, which brings vital low-interest loans to individuals and businesses in affected regions, until FEMA has made a decision on whether to authorize Individual Assistance (IA) programs. A state may have received a Presidential Disaster Declaration, but there is often significant delay in receiving an IA decision due to a lengthy Preliminary Damage Assessment, or because a state is in the process of appealing an IA denial from FEMA. In both cases, the region affected by the disaster may have easily met the criteria for an SBA declaration, but this essential aid is hindered by dependence on FEMA's IA decision.

After the 2014 Napa Earthquake, the SBA Disaster Loan Program approval process lasted ten weeks. During this time, some businesses closed their doors and others moved out of the area, but ultimately the economic recovery of the region was harmed. Given these challenges, the SBA

disaster assistance program request process needs to be expedited to get essential funding to qualified individuals, households, and businesses as quickly as possible and to keep the economy from suffering in the days and weeks immediately following a major disaster event. The SBA Administrator should be unburdened from red tape preventing declaration when damages clearly meet the SBA criteria, regardless a state's intent to request Stafford Act programs through FEMA and the President. The SBA has indicated its eligible contiguous county policy would cause confusion and possible unfairness if an SBA declaration and a Presidential declaration, after the fact, included different eligible counties. California suggests this is something that can be remedied through your assistance, if necessary, or between FEMA and SBA in order to expedite recovery.

Short-Term and Long-Term Housing Solutions

Housing solutions for survivors continues to be a top priority for Cal OES. Shortly after the October fires began, Cal OES and FEMA established a Joint Housing Task Force dedicated to two goals: identifying short-term and long-term housing solutions. Short-term housing was a joint federal-state effort, including partnerships at the local level and with the private sector achieved through contributions from the private sector, leveraged with state capabilities and properties, and federal resources. When IA was authorized for the Northern California wildfires, Transitional Sheltering Assistance, Housing Assistance, Direct Housing and Other Needs Assistance programs provided housing assistance and financial aid to eligible disaster survivors. Although there are many circumstances that can lead to delays in the dissemination of program funding, these programs have provided a necessary lifeline for survivors of the Northern California wildfires. Updated direct housing solutions and housing programs should be reviewed for more expedient ways to achieve survivors' post-disaster housing needs.

With regard to the long-term housing solutions, Cal OES continues to work in close coordination with local government leaders, state housing partners, and the U.S. Department of Housing and Urban Development to identify long term solutions for survivors, as well as identify mitigation measures which can be taken to avoid wildfire destruction in the future. We look forward to working with Congress and federal agencies on the allocation of valuable U.S. Department of Housing and Urban Development Community Development Block Grant funding to California and other impacted states that have suffered housing losses in the past year.

Infrastructure Investments

California has actively worked to sustain and promote partnership from the private sector, including investor-owned utility and telecommunications partners. Infrastructure system modernization and enhancements must be made across the United States to mitigate risks and lower disaster costs to local communities and federal taxpayers.

The devastation of the 2017 California wildfires highlighted the importance of robust, reliable emergency alert and communications systems. During the October wildfires, the California Public Utilities Commission reported a total of 341 cell sites as destroyed or offline. With approximately 80 percent of 9-1-1 calls coming from cellular devices, this impacted not only individuals attempting to reach 9-1-1, but also impacted the ability for people to receive wireless alerts and to access the Internet and detailed information about the fire. Wireless alerting requires a survivable (non-impacted) cellular network. Both 9-1-1 calls and alerts and warnings can only be received if the system remains on the air during a disaster.

In addition to ensuring the network is available, there is a need for a unified emergency alert system. Since different methods are currently being used to reach the public, it would be helpful to have a standardized message format for all delivery platforms that could be sent one time to all users. Education, best practices and outreach is also needed to help local officials determine which alerting method or methods should be used during a disaster.

Federal support with legislation and funding is needed to improve 9-1-1 resiliencies. Hardening of the cellular networks would initially require the Federal Communications Commission (FCC) to direct the cellular carriers to harden the infrastructure, improve carrier reporting, and increase training and outreach regarding the limitations of the current cellular network. Although all carriers adhere to baseline regulatory and statutory requirements, enhancing these requirements based on best practices for wireless providers may be the only way to ensure the cellular network is available when needed. A functioning cellular network is required for the wireless emergency alerts and warning to mitigate loss of life and property.

Emergency Management Performance Grants

As the State of California looks to the future with our local and tribal communities, private sector and non-profit partners, and federal counterparts, there are actions needed to prepare for and mitigate the effects of future disasters. Across the nation, response and recovery costs to public agencies and first responders are increasing at an untenable rate. If local, state, and federal emergency management agencies are to keep pace with these dynamic disasters, there need to be proactive, targeted investments made towards reducing the cost of response and recovery.

FEMA's Emergency Management Performance Grant (EMPG) enables funding for state, local, and tribal governments to prepare for all hazards through planning, training, exercises, and professional development. It supports agency response capabilities, emergency operations centers, mutual aid agreements, and public outreach campaigns, including community alerts and warning notification systems. Together with other forward-leaning measures, California has leveraged these EMPG funds to help build preparedness throughout all levels of government.

In fiscal year 2017, Congress committed \$350 million to EMPG which, factoring in the minimum-required dollar-for-dollar match, translates to an impact exceeding \$700 million. The President's Fiscal Year 2019 Budget proposes a \$71 million decrease in EMPG funding, to \$279 million. However, according to data from a survey taken by the National Emergency Management

Association, the number of disasters nationwide has risen by forty percent since 2013. The National Emergency Management Association is advocating for a five percent increase in EMPG funding for fiscal year 2019, however we believe that a much greater investment should be made to this invaluable program. After witnessing the devastation caused by the 2017 wildfires, our state and local governments understand now more than ever the importance of building all-hazards emergency management capacity at the local, state, and tribal levels. Without maintaining mature emergency management systems, more disasters will exceed state and local capabilities, requiring costlier federal response and recovery support.

Conclusion

The economic impact of these events cannot be understated as suppression and recovery costs have exceeded all estimated budgetary needs. We are appreciative that the Congress passed the latest federal disaster appropriation. This funding, allocated through FEMA, Department of Agriculture, Small Business Administration, and other agencies, will go a long way to aid communities in impacted regions throughout our state.

Thank you for the opportunity to testify before you today and for your ongoing support of disaster resiliency, response, and recovery in the face of increasingly escalating threats. I look forward to answering your questions.



COUNTY OF SONOMA

BOARD OF SUPERVISORS

575 ADMINISTRATION DRIVE, RM. 100A SANTA ROSA, CALIFORNIA 95403 (707) 565-2241

SUSAN GORIN

1st District Supervisor, County of Sonoma

STATEMENT FOR THE RECORD

Before the United States House of Representatives

Committee on Transportation and Infrastructure

Subcommittee on Economic Development, Public Buildings, and Emergency Management

Impacts of the 2017 Wildfires in the United States

Tuesday, March 20, 2018

2167 Rayburn House Office Building, Washington, DC

March 20, 2018

Chairman Barletta, Congressman Johnson, and members of the Subcommittee on Economic Development, Public Buildings, and Emergency Management. I'm pleased to be here today to share with the Subcommittee our experiences in Sonoma County, and the lessons we have learned, relating to the horrible wildfires that so tragically struck our County just five months ago. I would also like to express our special appreciation to Congressman Huffman, who serves so well on this Committee, and to Congressman Thompson, for their diligence and responsiveness in helping us respond to the worst disaster to strike the County during the lifetimes of any of our residents.

I am here before you in both a professional and personal capacity, for I am both a County Supervisor - whose district lost thousands of homes - and a survivor - who personally lost her home in the fire siege. I represent Sonoma County, located 45 miles north of the Golden Gate Bridge. Our beautiful and hardworking county of 500,000 is the heart of Wine Country and the Gateway to the Redwood Empire. On the evening of October 8th and into the early morning hours of October 9th, our community was overtaken by several wildfires. The wildfires burned through complete neighborhoods in just a few hours. Tragically, our county alone lost 24 people, of which the vast majority were elderly. Receiving more than 350 calls per hour, our local 911 dispatch system handled over 800 reported fires in the first 24 hours. Given the number of fires and the speed at which they advanced, the system was overwhelmed. That evening, we had to evacuate two of our three hospitals and over 100,000 residents, one-fifth of our population. In total, the fire burned over 100,000 acres in Sonoma County and destroyed 5,200 homes.

I want to thank Director Ghilarducci and the California Office of Emergency Services, as well as Administrator Fenton and the Federal Emergency Management Agency, for their unwavering support of Sonoma County over the past several months. Their efforts have made a real difference.

I'm here today to share a few observations from the fires with the hope that other communities may benefit from our experiences:

1. Community Warning Systems

As Director Ghilarducci notes, the devastation of the 2017 California wildfires highlights the importance of robust, reliable, and effective emergency alert and communications systems. We must develop and implement standardized message formats as well as education and training for both the general public and our local emergency response officials. Most importantly, we need to realize the full potential of all the various warning systems and technologies to ensure we can provide aggressive and compatible emergency communications that meet the needs of our vulnerable populations including those with access and functional needs.

March 20, 2018

Emergency alerts and warnings are only effective if they get through. Poorly designed, complex, and unevenly deployed technologies impede the timeliness, accuracy, and effectiveness of warnings. The increasing dependence on wireless and social media systems, means that government – local, state, and federal – must continue to develop tools that can reach people where they really live. While we applaud the FCC's recent moves to improve the effectiveness of the Wireless Emergency Alert (or 'WEA') system, this is but one step needed to advance the ability of residents to receive targeted and truly informative emergency information. Additional work is needed to get telecommunications providers to improve the capabilities of their systems for public information and warning and to protect these critical systems when disasters strike.

As I stated previously, at least 17 of our 24 deaths resulting from the wildfires were of people at least 67 years old. It has been reported that over half of those who perished in the Hurricane Katrina disaster were over the age of 65. Taken together, this should tell us something. I would hope that this would tell FEMA and everybody listening that, as a nation, we need to be doing more to prepare for the evacuation of our older residents when disaster strikes. Additionally, we had at least one other resident die who was wheelchair bound. And during previous disasters in recent years, we know we had great difficulty in convincing some of our homeless population, whose encampments were clearly imperiled by advancing floodwaters, of the need to relocate.

We urge that emergency preparedness plans around the country address the best means for assuring that the elderly, disabled, and homeless be properly evacuated in the event of an emergency. We hope that FEMA will place some emphasis on this and, with FEMA assistance, we would be pleased to develop a plan that might serve as a best practice for others to follow and adapt for their own communities.

Additionally, we know how critically important it is to have effective vegetation management efforts in the wildland-urban interface areas.

2. Disaster Preparedness

As our culture evolves, so too do our expectations of each other and the institutions that serve us. Local governments are on the front line as we directly provide the services and resources that our citizens depend upon. In the area of emergency response, our citizens have come to expect timely fire, law and EMS response via the 911 system. However, as recent disasters have continued to demonstrate, there will be times and occasions when these systems can't cope with the scope or scale of the demand. We applaud FEMA's current initiative to help the nation develop a culture of preparedness. Educating our residents and moving them toward actively preparing for disasters such as floods, hurricanes, and wildfires is an area where federal leadership and resources are vital. As the

March 20, 2018

direct and indirect costs from ongoing disasters continue to mount higher and higher, now is the time to examine just how much we are willing to spend in effort and treasure before disaster strikes. As Benjamin Franklin famously said "By failing to prepare, you are preparing to fail."

In Sonoma County, many residents lost their lives, their homes and their possessions due to the difficulty of warning them of a rapidly approaching and poorly defined threat. Warning others is predicated on understanding the nature of the event that is being faced. Enhancing the ability of first responders to fully grasp a rapidly developing disaster as it unfolds, is critical. The ability to provide "situational awareness" is fundamental to effective early alert and warning efforts. Understanding what is happening is that fundamental first step in deciding what to do about it. In Sonoma County, our 911 system was overwhelmed trying to answer calls from the public and coordinating the initial response — our national 911 system has to expand its capabilities to better support this dual mission. We need better resources to integrate and manage the massive shifts in mobile technology as well as quickly integrate disparate sources of information into a cohesive picture.

3. Disaster Mitigation

I understand that there has been considerable work in both the House and Senate to develop new approaches for disaster management and preparedness. One proposal referred to as the 6% proposal (putting the equivalent of 6% from the previous year's disaster impact into predisaster mitigation funding for the current year) is imperative to help our nation move from being reactive to being proactive. One thing that Mark Ghilarducci and Bob Fenton (both with me today) always say is that all Disasters start local and end local. Preparedness fits into that category as well. We must learn from the disasters that have devastated large areas across the nation in the last year as a turning point from which to finally and truly embrace pre-disaster mitigation. We seek your support to help us, at the local level, in order to help you at the federal level. Pre-disaster mitigation funding is essential to implement much needed programs including:

- a. Better addressing the needs of Vulnerable populations this has to include effective warning systems and practical evacuation planning
- b. More effective vegetative management approaches and practices in the wildland urban interface areas.
- Support for a broader and more effective public outreach campaign to help individuals be better prepared in their communities.

March 20, 2018

4. Recovery Challenges - Housing

The predominant factor in a community being able to recover from a disaster is directly tied to how quickly the community is able to rebuild. As I mentioned, our community lost over 5200 homes. Fire survivors are facing several significant challenges in their effort to being able to rebuild. First, the vast majority of fire survivors were significantly underinsured. Second, our region simply does not have sufficient numbers of construction workers to rebuild 5,200 houses. Christopher Thornberg with Beacon Economics calculated that Sonoma County would need 17,000 new construction workers to rebuild our houses in one year. Even a three-year rebuild horizon would require 6,000 new construction workers to come into our County. However, we have no place to house them. There is no place for new construction workers to live in our county. In Sonoma County, we were already experiencing a severe housing shortage prior to the fires. Our pre-fire vacancy rate of 1.5% has since diminished further. The fires have exacerbated the housing crisis in Sonoma County.

In addition to the significant challenges faced by burned-out homeowners, there is an additional subset of our local population who have been greatly impacted by the wildfires. These are renters who have been displaced from their homes as landlords have given give them notices to vacate in order to make room for other fire survivors. These renters have no place to go in our community, given our severe housing shortage. Some of them, no doubt, will find themselves living in their cars or on the streets.

It is imperative for our recovery efforts that federal programs be flexible so that we can address our most critical needs at the local level through creative solutions. We greatly appreciate the 90% cost share from FEMA. We, of course, appreciate the supplemental funding offered by Congress to California and to other communities that were so devastated in 2017.

The most important focus now, though one not under the jurisdiction of this Committee, is the HUD CDBG-DR and USDA Emergency Watershed Protection programs. Along with the City of Santa Rosa, our largest city, County seat, and home of so many who have lost their homes, we ask that HUD exercise the authority with which it was provided in the Disaster Supplemental Appropriations bill, and allocate CDBG funds directly to our municipalities. And we ask you as our Legislative branch to not just deploy those monies to the federal agencies, but to also ensure that they administer it according to their intended use while providing us with maximum flexibility. We in Sonoma County and the City of Santa Rosa have experienced significant impacts to our residents and to our local economy, and these programs are vital for us to recover from this disaster and to continue our renewed focus on disaster mitigation to prevent future disasters of this scale.

March 20, 2018

In conclusion, the devastation that Sonoma County experienced will happen again. The contributing factors prompting the firestorm was extreme weather – record low humidity, vegetation by impacted by years of drought, and wind gusts in excess of 75 miles per hour. All of this combined to create the perfect conditions for a true fire storm. With climate change, this extreme weather will increasingly impact communities across our nation. We need to prepare our systems, our responders, and our citizens to face the challenges of this new normal – our new reality.

Thank you for the opportunity to testify before you today and for your ongoing support of disaster resiliency, response, and recovery in the face of increasingly escalating threats. I look forward to answering your questions.



STATEMENT OF

ERIC W. HOLLY DEPUTY FIRE WARDEN/DEPUTY DIRECTOR OF EMERGENCY SERVICES STANISLAUS COUNTY, CALIFORNIA

BEFORE THE

COMMITTEE ON TRANSPORATION AND INFRASTRUCTURE
SUBCOMMITTEE ON ECONOMIC DEVELOPMENT, PUBIC BULDINGS,
AND EMERGENCY MANAGEMENT
U.S. HOUSE OF REPRESENTATIVES WASHINGTON D.C.

IMPACTS OF THE 2017 WILDFIRES IN THE UNITED STATES

MARCH 20, 2018

Chairman Barletta, Ranking member Titus and distinguished members of the Subcommittee, thank you for the invitation to testify today about the impacts of the 2017 Wildfires in the United States. I am Chief Eric Holly, Deputy Fire Warden/Deputy Director of Emergency Services for Stanislaus County, California. In addition to my normal day-to-day duties, I am a Fire/Rescue Operational Area Coordinator and Emergency Management Mutual Aid (EMMA) Coordinator for Stanislaus County.

Stanislaus County is located in the Central Valley of California and in the southern portion of California's Mutual Aid System, Region IV. Within the Stanislaus County Operational Area is the Diablo Mountain Range in the Western portion of the county and the foothills of the Sierra Nevada Mountain Range in the Eastern portion of the county. The county has a population of just over 500,000 people. There are currently twenty-one (21) agencies that have responsibility for fire services within the county. The fire agency staffing models vary from: full time paid career staff, combination paid career and volunteer staff, and fully volunteer staff. They range in size from a one station agency to our largest agency with eleven stations. Some of the fire agencies have contracted for services with other agencies or formed a Joint Powers Authority (JPA) to reduce costs or streamline services. Each agency participates, at some level, in the California Fire/Rescue Mutual Aid System.

During times of emergencies and disasters I am responsible for coordinating the local agency response resources from Stanislaus County to those incidents as well as any requests for assistance that would come from my county should we suffer an emergency or disaster that goes beyond our capabilities. As part of the California Office of Emergency Services (CalOES) Fire/Rescue Mutual Aid and EMMA Systems Stanislaus County, in the past several years alone, has responded by providing fire engines and individual personnel to wildfires statewide: from the border of Mexico to the border of Oregon, to the State of Washington, the State of Montana, and Puerto Rico for Hurricane Maria. Personnel from multiple disciplines including: Fire, Law Enforcement, Emergency Medical Services, Animal Services, Public works, Building Department, Public Health, and County Administration Departments have all been deployed to assist other Operational Areas in their time of need.

Impacts of the 2017 Wildfires in the United States

Stanislaus County agencies continue to support the California Mutual Aid System however, as in years past Stanislaus County has found itself unable to fill some of the requests received for mutual aid coming from the major wildfires throughout the state during 2017. Agencies are only able to assist so much before they have a drawdown of their own resources to an exhaustion level. We have found ourselves turning down requests more and more each year for these reasons. Some of our agencies that have full time paid career firefighters have had to reduce staff and close fire station due to lack of funding. Volunteer fire agencies have been

having trouble keeping staff levels up for years and what staffing they do have fluctuates with the season.

Most of our volunteer fire agencies are in rural, agricultural areas of the county. During harvest season and other specific times of the year many volunteer firefighters are committed to their farms and ranches and have a limited capabilities to respond to calls for service within their fire district. Without a sufficient response in their home district those agencies are unable to send out fire apparatus and personnel for large wildfires because they must be able to provide services for their own district.

Even with these challenges counties have been able to put fire equipment on the road in times of need. When a large wildfire starts, county Operational Area Coordinators begin assessing their county for any current large incidents that may prevent an out of county response. They begin polling their local agencies for their capability to respond to the larger incident. All of this information is then forwarded to the California Region IV Fire/Rescue Regional Mutual Aid Coordinator.

Over recent years, responses from the Stanislaus County Operational Area Fire resources to statewide incidents have increased at about the same rate as all other Operational Areas within Region IV. This includes fire apparatus as well as individual personnel to assist with the operations and management of the incidents. Agencies respond multiple times throughout the year to these incidents and many times are demobilized from one incident only to be sent directly to another.

At times we will not have enough equipment or trained personnel in our county to fill requests for Strike Teams of engines to an out of county wildfire. Strike Teams are multiple units of the same kind and type of equipment with a leader. When this occurs the Operational Area Coordinators have called their neighboring counties to pull together enough resources to be able to fulfill the request and respond. Other times the coordinators will put together multiple resources of different kind and type of equipment with a leader these are known as a Task Force and make them available to respond in place of Strike Teams if it is appropriate for the incident. Without the coordination between neighboring jurisdictions we would see far less Strike Teams and Task Forces responding to wildfires than we see today.

We continue to work locally with state and Federal agencies on mitigating local hazards through planning, educating the public, training and exercising for all hazards. Through federal grant funding as a sub-grantee of the Homeland Security Grant Program (HSGP) Stanislaus County has been able to assist all nine of its cities within the county and many of the counties special districts with their hazard mitigation planning. The goal which is meeting the core capabilities of the National Preparedness is necessary for resilient communities. The devastation created

by a wildfire can cripple a community leaving it vulnerable to secondary type events such as landslides

Weed abatement and fuels reduction is an ongoing task for us. Each year agencies spend numerous hours identifying and notifying property owners of hazardous situations including the fire hazards of overgrown and uncontrolled vegetation. While this practice is time consuming it is vital to reducing the fuel loads of vegetation fires and creates Defensible Space around structures to assist responding fire personnel. We constantly struggle to keep up with requests from the public regarding fire hazards. With all the responsibilities of fire agencies, many of them are reactive rather than proactive to vegetation management issues because they do not have the staffing. Some of our county fire agencies boundaries are within the State Responsibility Area (SRA) and they have a mutually beneficial working relationship with our state fire agency, Cal FIRE and their mitigation and public education efforts benefit from that relationship.

Public Education has some of the same areas of concern. Staffing challenges and funding for the education programs continue to be a concern. When agencies have staffing issues for emergency responses public education suffers. We continue to take lessons learned and best practices from wildland fire incidents and implement them in county.

It is important to remember that we need to invest our money and resources up front. Investment in creating emergency plans, mitigation programs and public education will save lives, property, and environment. Increasing staffing or pre-positioning fire equipment during Red Flag Warnings or other high probability events likely lessen the likelihood of the incident growing into a major wildland incident. By having more equipment staged and staffed and closer to the area of wildland fire concern a quicker response can be had. While the California Fire/Rescue Mutual Aid System works well equipment can only get there fast. Distance and time are not our friends when it comes to a wildland fire.

The Stanislaus County Operational Area did not have a major wildland fire incident in 2017. It very well could have. We like many of California's counties feel lucky that we were not affected like other California counties. Much work has been done to improve public safety, wildland fire response, and recovery in our county but there is still much more to be done. We have had major wildland fires in our county in the past and we will have them again. It's not a question of if but when. We look forward to continued cooperation and coordination between local, State, and Federal resources.

All agencies in Stanislaus County attempt to educate themselves on Wildland Urban Interface scenarios and train to the latest standards. Training is conducted annually and we continue to look back at lessons learned to ensure safety and efficiency in our wildland responses. But we

could do more. One area we look for improvement in is the training of personnel to fill all positions on the fire engines with certified and qualified individuals for out of county responses to wildfires. Some of the smaller agencies do not have enough personnel certified and qualified at certain fire positions to be able to sustain an out of county response. We have been working toward increasing the number of staff but with volunteer attrition rates just keeping up is challenging. Recruiting and maintaining volunteer firefighters is a challenge. Some agencies have been seeing success with the use of the Staffing for Adequate Fire and Emergency Response (SAFER) Grants. This funding has made a positive impact and we hope to see it continue.

Additionally, most if not all agencies have been the recipient of the Assistance to Firefighters Grant (AFG) Program funding. Specifically, the funding of the communications equipment to allow for interoperability between agencies on emergency incidents has been beneficial. Without this funding many of our fire agencies would not have the proper communication equipment to respond statewide as part of the Mutual Aid System. Again, this type of funding has made a positive impact on local agencies' ability to respond safely to incidents within their jurisdictional boundaries as well as participate in the California Mutual Aid System.

We must continue to emphasize education and training to strengthen our ability to respond safely and effectively locally and statewide to wildland fire events. But without properly well maintained equipment we would be unable to assist. There are many pieces to puzzle and without one of them our statewide response would be hampered.

Conclusion

I thank you for the opportunity today to testify about the impacts of the 2017 Wildfires in the United States. Pre-disaster mitigation, emergency preparedness and training, an effective timely response, and disaster recovery are all important to the safety and well-being of our local communities. The continued commitment to the coordination of these at the local, state and federal levels is critical to being successful in providing for a safe and healthy community.

By continue to build on our successes and learned lessons we will build a better fire service. We must cooperate, coordinate, collaborate and communicate for this to keep our communities safe and resilient.



Impacts of the 2017 Wildfires in the United States

Statement of

Fire Chief Thomas Jenkins President and Chairman of the Board

presented to the

SUBCOMMITTEE ON ECONOMIC DEVELOPMENT, PUBLIC BUILDINGS, AND EMERGENCY MANAGEMENT

OF THE COMMITTEE ON TRANSPORTATION AND INFRASTRUCTURE

U.S. House of Representatives

March 20, 2018

International Association of Fire Chiefs 4795 Meadow Wood Lane, Suite 100, Chantilly, VA 20151 Good morning, Chairman Barletta, Ranking Member Titus and members of the subcommittee. I am Chief Thomas Jenkins V, fire chief of the Rogers Fire Department in Rogers, Arkansas, and president and chairman of the board of the International Association of Fire Chiefs (IAFC). The IAFC represents approximately 12,000 leaders of the fire, rescue and emergency services. Thank you for the opportunity to testify today about the impacts of the 2017 wildland fires in the United States.

The local fire department is an all-hazards response force that must provide:

- fire suppression
- · emergency medical response
- · hazmat response
- · multi-casualty, civil unrest and terrorism response
- · urban search and rescue
- train-derailment response
- technical, high-angle, swift-water, building-collapse, confined-space and deep-trench rescue

During times of crisis, the local fire department serves as the closest thing to government that provides service to the victims, their communities, their families and their friends.

The IAFC is concerned by the continuing increase in costs and damages caused by wildland fires across the nation. According to the National Interagency Fire Center, there were 71,499 wildland fires reported across the United States in 2017. These fires burned 10,026,086 acres and a total of 12,306 structures, including 8,065 residences, 4,002 minor structures, 229 commercial structures and 10 mixed commercial-residential structures. By comparison, there were 67,743 wildland fires in 2016, which destroyed 5,509,995 acres. These statistics demonstrate that even if the number of fires remains similar, the damage done by these fires is increasing in severity. \(^1\)

The increasing severity of these fires also affects federal wildland-fire suppression costs. For 2017, the federal government spent a record \$2.9 billion on wildland-fire suppression. By comparison, the average cost of federal wildland-fire suppression operations from 2008 to 2012 was \$1.3 billion. For the following five years, the average annual cost rose to \$2 billion, an approximate 36% increase in costs.²

The increasing damage incurred by wildland fires and the escalating cost of suppressing them is caused by several factors, including the growing density and decreasing health of our forests, a hotter and dryer trend in climate and the increase in the number and density of homes built in the wildland-urban interface.

¹ National Interagency Coordination Center, <u>Wildland Fire Summary and Statistics: Annual Report: 2017</u>, p. 7. (https://www.predictiveservices.nifc.gov/intelligence/2017 statssumm/intro_summary17.pdf).

National Interagency Coordination Center, <u>Federal Firefighting Costs</u> (<u>Suppression Only</u>). (https://www.nifc.gov/fireInfo/fireInfo_documents/SuppCosts.pdf).

To address these trends, the IAFC supports the National Cohesive Wildland Fire Management Strategy. This strategy was developed by federal, state and local partners to address the wildland-fire issue. It promotes three collaborative tenets:

- · landscape-scale forest management
- · the promotion of fire-adapted communities
- · collaborative response to fire in the wildland and wildland-urban interface

To address the national wildland-fire problem and the ensuing damage caused by wildland fire and post-fire floods and landslides, the nation must continue to support collaborative efforts like the Cohesive Strategy. From the perspective of the fire and emergency service, federal, state, tribal/territorial and local partners must focus on promoting greater community-preparedness efforts, effective response and mitigation activities.

Community Preparedness

Communities must take steps to protect themselves and be prepared for the threat of wildland fires. They can set and adopt codes to ensure that residences are built using fire-safe materials and fire-resistant landscapes. Homeowners should ensure that they have cleared brush and vegetation around their homes to create defensible space.

Federal, state, tribal/territorial and local governments must work together to clear hazardous fuels in their communities. To effectively address these and other hazards, localities should adopt community wildfire protection plans (CWPP). These plans help to identify and mitigate wildland-fire risks within communities. They also help to guide hazardous-fuels reduction programs on federal lands and prioritize federal funding for associated projects.

With the assistance of the U.S. Department of Agriculture's (USDA) Forest Service, the IAFC runs the "Ready, Set, Go!" (RSG) Program to help communities prepare and respond to the threat of wildland fires. Using RSG resources, local fire departments assist residents in developing mitigation plans (Ready) and teach them to be situationally aware (Set) and to act early and follow their personal wildland-fire action plans should there be a need to evacuate (Go). Currently, there are 1,803 RSG members in all 50 states.

The RSG Program helps federal, state and local partners collaborate to prepare for wildland fires. For example, the Kittitas County (Washington) Fire District #7 joined RSG in 2012. Over the years, the fire district has worked with The Nature Conservancy, Kittitas County Conservation District, Washington Resource Conservation & Development Council and other partners to form the Kittitas County Fire Adapted Communities Coalition. This collaboration includes fuel reduction/treatment, youth outreach, civic events, homeowner's association outreach, home assessments and door-to-door outreach with smoke alarm installation. In the fall of 2017, the Jolly Mountain Fire threatened 1,500 homes in the district. In response, the fire district held public meetings to distribute RSG materials and help residents prepare for the fires. These efforts were livestreamed on Facebook to reach 700 residents in addition to the more than 50 citizens who attended the meetings in person. The coalition is now working to update the county's CWPP.

The Florida Forest Service (FFS) presents another example of the effectiveness of the RSG program. The FFS took the lead in developing the RSG Program by involving state, county, federal and private-sector partners. The coalition developed a Florida RSG Action Guide to implement the program and created videos, public service announcements and kits for door-to-door outreach to local citizens. The FFS RSG program has also expanded from education to even collaborate on prescribed burns and CWPPs. Due to the FFS' efforts, their RSG program has more than 80 participating fire departments and has given out over 300 RSG kits and 20,000 RSG guides.

Community preparedness is a key component to addressing the wildland-fire issue. By promoting collaboration at the local level, communities can work with federal, state, tribal/territorial and local partners to educate local citizens about the risk of fire and help them take actions to reduce these risks. Community-preparedness programs can also help localities reduce the threat of fire by collaborating on efforts to reduced hazardous fuels and help residents make their homes more fire-safe. Finally, these programs are important in helping local citizens evacuate safely and in a timely manner.

Improved Response Capability

When a wildland fire breaks out, it is important to have an effective response to reduce the potential for loss of life, injury and property damage. Local fire departments—in many cases, volunteer fire departments—provide nearly 80% of the initial attack on wildland fires in the U.S. These fire departments provide wildland fire and emergency protection to 43% of the nation's population, which is an estimated value of \$36 billion per year.³ In situations where federal landmanagement agencies are responsible for fire protection on their lands, they rely on local fire departments for initial attack and surge capacity to assist them through mutual-aid agreements. For large fires, fire departments can respond from around the U.S. to assist. For example, 17 states, including North and South Carolina provided assistance to help California respond to the October wildland fires.

In order to ensure an effective response to wildland fires, the IAFC would like to work with the committee and federal agencies, including the USFS and the Federal Emergency Management Agency (FEMA) to improve or build upon existing policies. One key component is the need to have well-vetted qualifications of response staffing and resources. The National Wildfire Coordinating Group's (NWCG) publication, National Incident Management System: Wildland Fire Qualification System Guide (NWCG 310-1), establishes minimum requirements for training, physical fitness and experience for wildland-fire positions, which participating agencies have to meet for national mobilization.

The IAFC supports existing efforts for alternate routes to qualification, such as recognition of prior learning and efforts to qualify structural firefighting skills for wildland firefighting duties. In addition, we support FEMA's efforts to improve adoption of NIMS and the Incident Command System by fire departments, emergency medical services and law enforcement

³ "Volunteer Fire Assistance: providing a little help to our friends," USDA Forest Service, https://www.fs.fed.us/fire/partners/vfa/.

agencies across the U.S. By having universally recognized qualifications and incident command principles, fire resources from various parts of the country will be able to operate together seamlessly on the fireground.

Another area that needs to be addressed is resource ordering and tracking. As an addition to the Emergency Management Assistance Compact (EMAC), the IAFC developed the Intrastate Mutual Aid System in the aftermath of Hurricane Katrina to help states create statewide mutual-aid agreements and plans to deploy fire department staffing and equipment in response to major disasters and everyday incidents. To help states manage their resources, the IAFC developed Mutual Aid Net, which 18 states are using today.

As a further evolution, the IAFC has partnered with Intermedix's WebEOC and ESRI's ArcGIS platforms to develop the National Mutual Aid System (NMAS). NMAS will be a tool used to request, locate and deploy resources through all phases of a response. Using NMAS' GIS mapping tools, fire departments will be able to visualize in real-time where resources are and where they need to go and determine response times for decision-making. Beta testing of the NMAS will begin soon in five states: Arizona, California, Florida, Tennessee, and Utah.

One continued challenge to an effective response is the timely and complete reimbursement of fire departments after major wildland fires and other disasters. When a state requests fire-response personnel and resources through the EMAC, local communities send their firefighters and apparatus to respond. These costs are then borne by the communities until they are reimbursed. Sadly, the reimbursement process can take months or even years as the complicated federal/state process unwinds. Local leaders are left facing holes in their budgets and must make difficult spending decisions like cutting budgets, stretching funds or raising taxes to provide the expected level of service to their communities while waiting for final reimbursement. The IAFC requests that FEMA develop a streamlined process for reimbursing states for emergency-response operations and making sure that the states reimburse the local agencies in a timely manner. In addition, we ask that local agencies be made whole for their expenses, including setting a reimbursement rate for volunteer firefighters.

At the Congressional level, the IAFC asks Congress to take action to end the practice of fire borrowing at the USDA Forest Service and U.S. Department of Interior (DOI). Currently, the agencies use a 10-year average to estimate the costs of wildland-fire suppression for the upcoming fiscal year. Unfortunately, as the cost of wildland-fire suppression escalates, these agencies find that their operations are underfunded. They are forced to take funds from forest management, hazardous-fuels reduction and other preparedness programs in order to pay for wildland-fire suppression operations. In September 2017, Secretary Perdue expressed concern that 2017 was the most expensive year on record for wildland-fire suppression costs and that the USDA Forest Service's spending on fire suppression had escalated from 15% to 55% or more of the agency's budget.⁴

⁴ U.S. Department of Agriculture Press Release, "Forest Service Wildland Fire Suppression Costs Exceed \$2 Billion; Secretary Perdue Calls For Congress to Fix "Fire Borrowing" Problem," September 14, 2017, https://www.usda.gov/media/press-releases/2017/09/14/forest-service-wildland-fire-suppression-costs-exceed-2-billion.

To resolve the fire-borrowing problem, the IAFC recommends that USFS and DOI be able to access the Disaster Relief Allowable Adjustment (Disaster Cap). The Disaster Cap was created by the Budget Control Act of 2011 (P.L. 112-25) to provide a buffer for emergency spending above the mandatory defense and nondefense spending caps without requiring supplemental appropriations. Unfortunately, the Disaster Cap itself is underfunded due to its formula. The Disaster Cap fell from a high of \$18.4 billion in Fiscal Year (FY) 2015 to a low of \$8.1 billion in FY 2017. FEMA projects that the Disaster Cap will fall to \$7.4 billion in FY 2018 and fall again to somewhere between \$6.8 billion and \$7.3 billion in FY 2019. As the costs of all disasters continues to rise, Congress must fix the formula for the Disaster Cap and allow USDA Forest Service and DOI to access it for federal wildland-fire suppression operations.

The IAFC also asks Congress to continue to fund the USDA Forest Service's Volunteer Fire Assistance (VFA) program. This program provides federal assistance to state foresters to help rural fire departments respond to wildland fires on neighboring federal land. Communities with populations of less than 10,000 can receive training and equipment through the VFA program. The IAFC thanks the House of Representative for supporting \$16 million for the program in FY 2018, an increase over the president's budget request and the Senate's proposed funding level. We urge Congress to adopt the House's funding level for this program.

The IAFC also thanks Congress for reauthorizing the Assistance to Firefighters Grant and the Staffing for Adequate Fire Emergency and Response Grant programs last year. These programs help local fire departments protect their communities from all hazards. Many fire departments respond to wildland fires without adequately training or equipping their firefighters for these specialized operations due to financial constraints. The matching funds provided by the FIRE and SAFER grants help localities better train and equip for wildland fires and help recruit career and volunteer firefighters to staff their efforts. The IAFC urges Congress to fund the AFG and SAFER Grant programs at \$365 million each in FY 2018.

Mitigation

Another important aspect to addressing the wildland-fire problem is mitigation. The IAFC applauds the committee's focus on promoting mitigation to reduce the effects of major disasters. We endorsed the Disaster Recovery Reform Act of 2017 (H.R. 4460). We were glad to see provisions from this legislation included in the recent Bipartisan Budget Act of 2018 (P.L. 115-123), including those that would increase the federal cost share for disasters to 85% if states took steps to adopt building codes and invest in mitigation plans and investments to reduce the risk from all hazards.

The federal, state, tribal/territorial and local governments can take steps to mitigate the risk of wildland fires, including reducing hazardous fuels. Also, communities should adopt building codes and wildland-fire preparedness policies to reduce the threat of fires, especially as more Americans build homes in the wildland-urban interface. As the 2016 tragic fires in Tennessee demonstrated, the wildland-fire problem is not just a Western problem, but something that communities across the nation should identify and take steps to mitigate.

Related to the wildland-fire problem is the risk of flooding and landslides. Wildland fires can scar land and destroy vegetation. When rainstorms follow these fires, the risk of major flooding ensues. For example, Southern California suffered from a major winter storm that impacted areas in Montecito and Carpinteria that had been recently burned by the Thomas Fire. The resulting mudslides and debris flows made national news by killing 22 people and destroying over 100 structures. In March, California is still in the process of trying to clean up over 2 million cubic yards of debris.

The committee has been steadfast in its support of legislation to prevent this tragedy. H.R. 4460 included provisions that would allow states that receive Fire Management Assistance Grants (FMAG) to also receive hazard-mitigation assistance. This assistance would go to the localities affected by the wildland fires and allow them to reseed land, set up erosion barriers and take other actions to mitigate the risk of landslides, floods and future wildland fires. The IAFC appreciates that P.L. 115-123 includes provisions to allow states that received FMAGs in FY 2017 and FY 2018 to receive hazard-mitigation assistance. We look forward to working with the committee to make this program permanent.

Conclusion

I thank the committee today for the opportunity to represent the leadership of the nation's fire and emergency service and discuss the impact of the 2017 wildland fires. The specter of wildland fires now threatens communities across the nation. The IAFC looks forward to working with the committee and our partners at the USDA Forest Service and FEMA to reduce the risk of these fires. We are working to educate local communities about how to prepare for and mitigate the risk of wildland fires. Also, we are working with our federal partners to improve the response to wildland fires through better resource management and deployment in order to reduce their damage. Finally, we look forward to continuing to work with the committee to promote legislation to mitigate the damage these fires and resulting floods and landslides can cause. I look forward to answering any questions that you may have.